RIAN BV BERGSTRAAT 25
5581BL WAALRE

# User Manual

## WB100A

### *Table of Contents*


| | | |
|---|---|---|
| 1 | Preamble | 1 |
| 1.1 | Package Contents | 1 |
| 2 | Indicators and Connectors | 1 |
| 2.1 | LED Indicators | 2 |
| 2.2 | Hardware Installation | 3 |
| 3. | WB100A webpage settings | 3 |
| 3.1 | Login WEB page | 3 |
| 3.1.1 | URL format | 4 |
| 3.1.2 | About Passwords | 4 |
| 3.2 | WEB Page | 4 |
| 4. | Configure from web | 5 |
| 4.1 | Status | 5 |
| 4.1.1 | System Information | 6 |
| 4.1.2 | System Log | 8 |
| 4.2 | Network | 8 |
| 4.2.1 | WAN | 8 |
| 4.2.2 | LAN | 13 |
| 4.2.3 | VPN | 14 |
| 4.2.4 | MAC Clone | 14 |
| 4.2.5 | DMZ | 15 |
| 4.2.6 | DDNS | 15 |
| 4.2.7 | Advance | 16 |
| 4.2.8 | Port Setting | 16 |
| 4.2.9 | Multi WAN | 17 |
| 4.3 | Wireless | 18 |
| 4.3.1 | Basic | 18 |
| 4.3.2 | Wireless Security Setting | 20 |
| 4.3.3 | Wi-Fi MultiMedia | 22 |
| 4.3.4 | Wi-Fi Protected Setup (WPS) | 23 |
| 4.3.5 | Station Info | 24 |
| 4.3.6 | Advance Wireless | 25 |
| 4.4 | SIP Account | 26 |
| 4.4.1 | Line 1 | 26 |
| 4.4.2 | SIP setting | 30 |
| 4.4.3 | VoIP QoS | 31 |
| 4.5 | Phone | 31 |
| 4.5.1 | Preferences | 31 |
| 4.5.2 | Dial Plan | 34 |

| | | |
|---|---|---|
| 4.5.3 | Phonebook | 36 |
| 4.5.4 | Call Log | 39 |
| 4.6 | Diagnosis | 40 |
| 4.7 | Administration | 45 |
| 4.7.1 | Management | 41 |
| 4.7.2 | Firmware Upgrade | 44 |
| 4.7.3 | Provision | 44 |
| 4.7.4 | SNMP | 46 |
| 4.7.5 | TR069 | 47 |
| 5. | Functions | 48 |
| 5.1 | Making Calls | 48 |
| 5.2 | Call Waiting | 48 |
| 5.3 | Call Hold | 48 |
| 5.4 | Call Transferring | 48 |
| 5.4.1 | Blind Transfer | 48 |
| 5.4.2 | Attended Transfer | 48 |
| 5.5 | 3-way conference call | 49 |
| 5.6 | Call Forwarding | 49 |
| 5.7 | Speed dialing | 49 |
| 5.8 | Daylight Saving Time | 49 |
| 5.9 | Upgrade Firmware | 49 |
| 5.10 | Password Control | 50 |
| 5.11 | System log | 50 |

# 1. Preamble

Thank you for choosing WB100A VoIP home gateway products. WB100A home gateway is a highly integrated access device, and it is a kind of high-end multi-in-one gateway product which based on IEEE802.11n standard. This product is for individual users, SOHO (Small Office or Home Office) and small enterprises to provide high-performance access. It provides a wide range of management functions, can provide dhcp, dmz host, virtual servers, firewalls etc. management;

also it is able to set up the internal LAN, allowing multiple computers to share a single broadband line and ISP account; its specific firewall feature, can filter bad sites; also it supports disabling SSID broadcast mode, user can prevent AP broadcast the SSID, which can solve the leaks caused by SSID broadcast; WB100A supports WPA2 wireless dhome gateway encryption to ensure the security of dhome gateway transmission in a wireless network; it supports DHCP servers and dynamic/static routing; and it supports access control, the network administrator can control all the computer in the LAN access to the Internet through a router; supports virtual server and dmz host to meet specific application needs; it supports remote management and system logs, which brings large convenience for the network administrator to realize network management and real-time monitoring; and WB100A also supports UpNp, voice and video transmission, online audio and video transmission, online games and other rich features.

## 1.1 Package Contents

One WB100A package contains:

- One WB100A VoIP home gateway router
- One power adapter
- One Ethernet cable
- One telephone line

If the above device or accessory is damaged or lost, please contact with your reseller for replacement.

# 2. Indicators and Connectors

Before you use the high speed home gateway router WB100A, please get acquainted with the LED indicators and connectors first.

## 2.1 LED Indicators

(1) The positive side panel

(2) The rear panel

(3) The left side panel

## 2.2 Hardware Installation

Before starting to configure the router, you have to connect your devices correctly.

- Connect Line port to land line jack with a RJ-11 cable.
- Connect the WAN port to a modem or switch or router or Internet with an RJ- 45 Ethernet cable.
- Connect one port of 4 LAN ports to your computer with a RJ-45 Ethernet cable. This device allows you to connect 4 PCs directly.
- Connect one end of the power cord to the power port of this device. Connect the other end to the wall outlet of electricity.
- Check the Power and WAN, LAN LEDs to assure network connections.

***Warning: Please do not attempt to use other different power adapter or cut off power supply during configuration or updating the WB100A VoIP home gateway router. Using other power adapter may damage WB100A and will void the manufacturer warranty.***

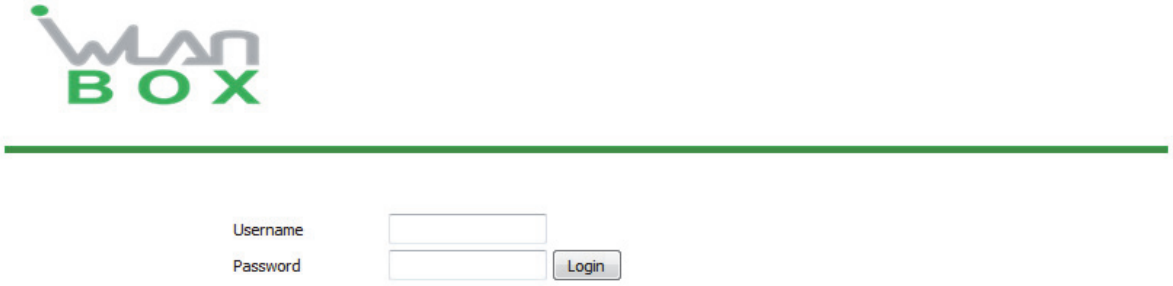
# 3. WB100A webpage settings

## 3.1 Login WEB page

WB100A has an embedded Web server that will respond to HTTP get/post requests. User can use a Web browser like Microsoft's IE or Firefox to login and then configure WB100A.

### 3.1.1 URL format

User can login from device's LAN ports, the default IP address of device's LAN port is 192.168.1.1. After entering the default IP address the page will go to the device's login page, as shown below:




### 3.1.2 About Passwords

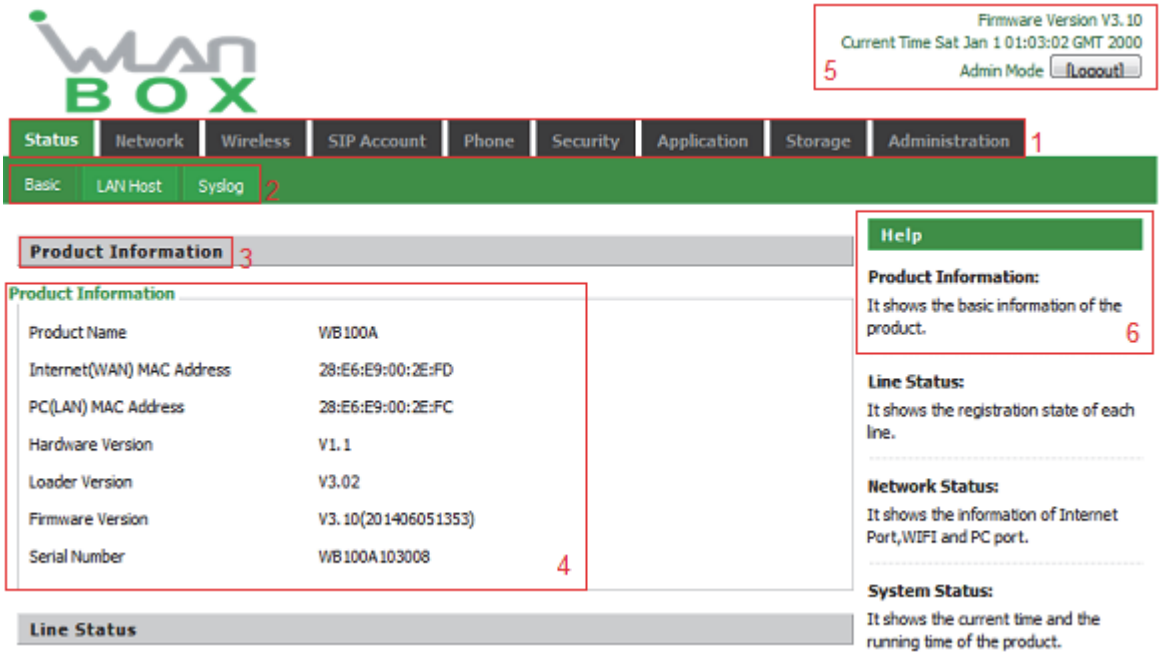
WB100A has two login levels, namely administrator level and general user level, different standards have different passwords.

General level user can browse and configure some parameters; and administrator level user can configure all other parameters.

WB100A's default administrator level username and password: admin/admin

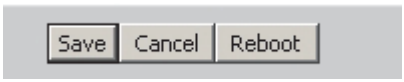
WB100A's default general user login username and password: user/user

## 3.2 WEB Page




| Number | Name | Description |
|---|---|---|
| 1 | Navigation bar | Click navigation bar, many sub-navigation bar will appear in the place 2. |

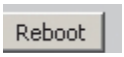
| | | |
|---|---|---|
| 2 | Sub-navigation bar | Click sub-navigation bar to enter to configuration webpage |
| 3 | Configuration title | The configuration title |
| 4 | Configuration bars | The configuration bars |
| 5 | Device Information | Display the firmware version, DSP version, Current Time, and login mode.<br>Press **Logout** button to logout. |
| 6 | Help | Display the main information of configuration; user can get help from it directly. |



Every time making some changes, user should press the button to confirm and save the changes.

After pressing the button, the red notice Please REBOOT to make the changes effective! will appear to notice user to reboot.

To cancel the changes




Press it to reboot WB100A

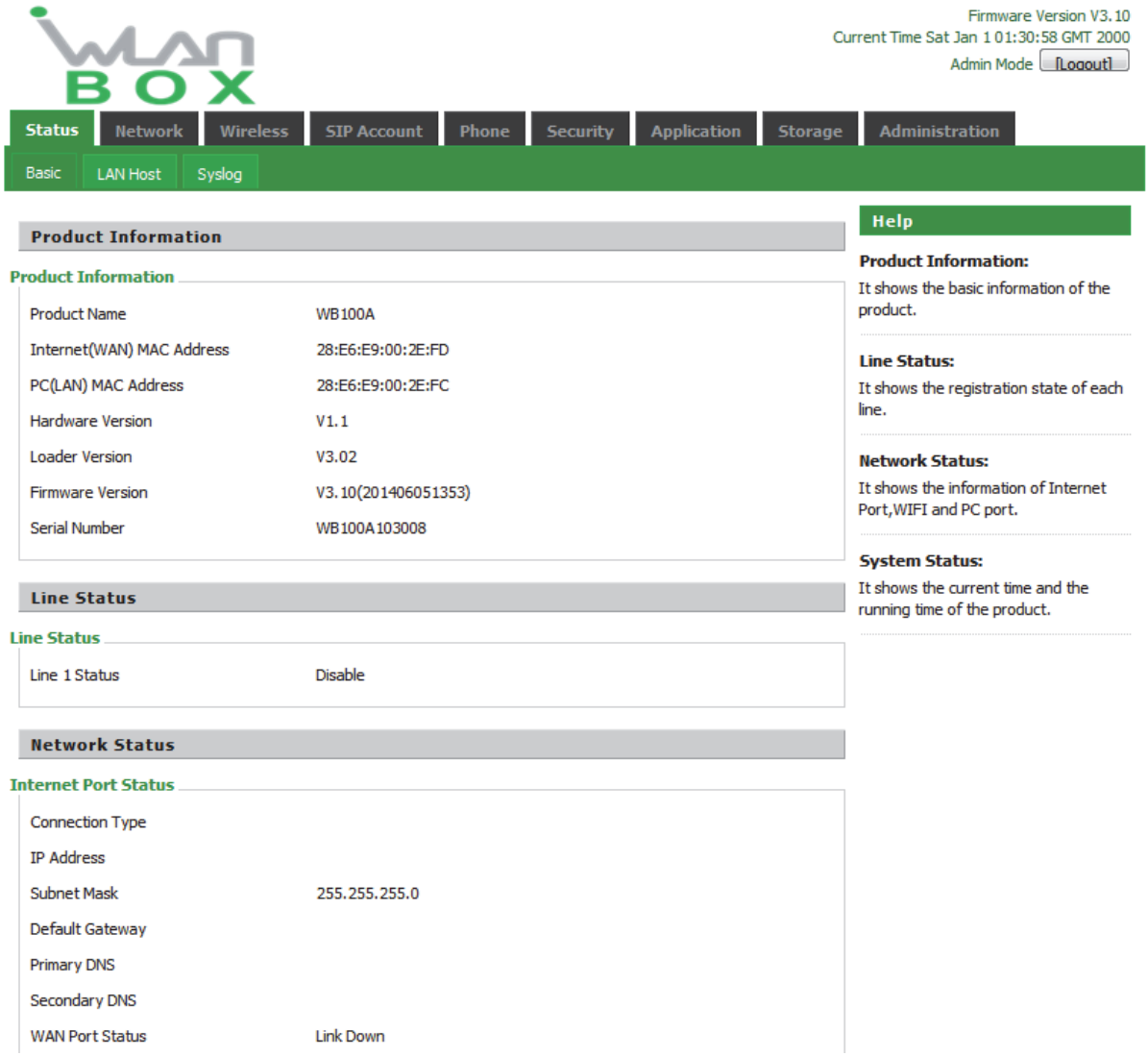
# 4 .Configure from web

## 4.1 Status

On this page, users can view the WB100A system information and system log information. It is the first page which user will see firstly after login to WEB.

## 4.1.1 System Information

On this page, user can view the product information of WB100A, SIP account status, network status and system status.



## TR069_VOICE_INTERNET Vlan Status

| | |
|---|---|
| Connection Type | |
| MAC Address | 28:E6:E9:00:2E:FD |
| IP Address | |
| Subnet Mask | |
| Default Gateway | |
| Primary DNS | |
| Secondary DNS | |

## VPN Status

| | |
|---|---|
| VPN Type | Disable |
| Initial Service IP | |
| Virtual IP Address | |

## LAN Port Status

| | |
|---|---|
| IP Address | 192.168.1.1 |
| Subnet Mask | 255.255.255.0 |
| LAN1 | Link Down |
| LAN2 | Link Down |
| LAN3 | Link Down |
| LAN4 | 100Mbps Full |

# System Status

## System Status

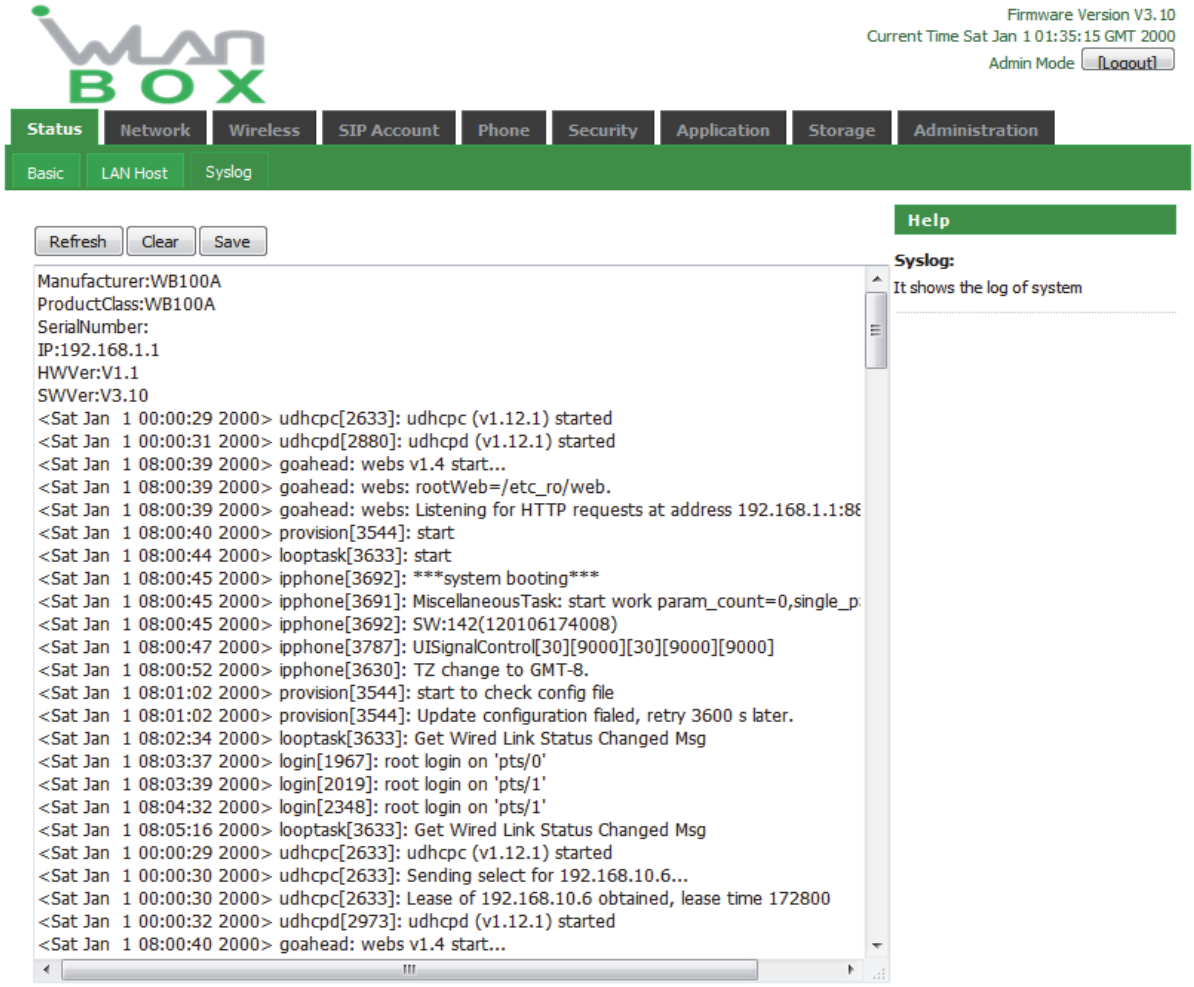
| | |
|---|---|
| Current Time | Sat Jan 1 01:30:58 GMT 2000 |
| Elapsed Time | 30 mins |

Refresh

### 4.1.2 System Log

In this configuration page, the user can view the system log, WB100A system recordings contain important configuration information.

On this page, users can click the corresponding button to refresh, remove and save the relevant system information.

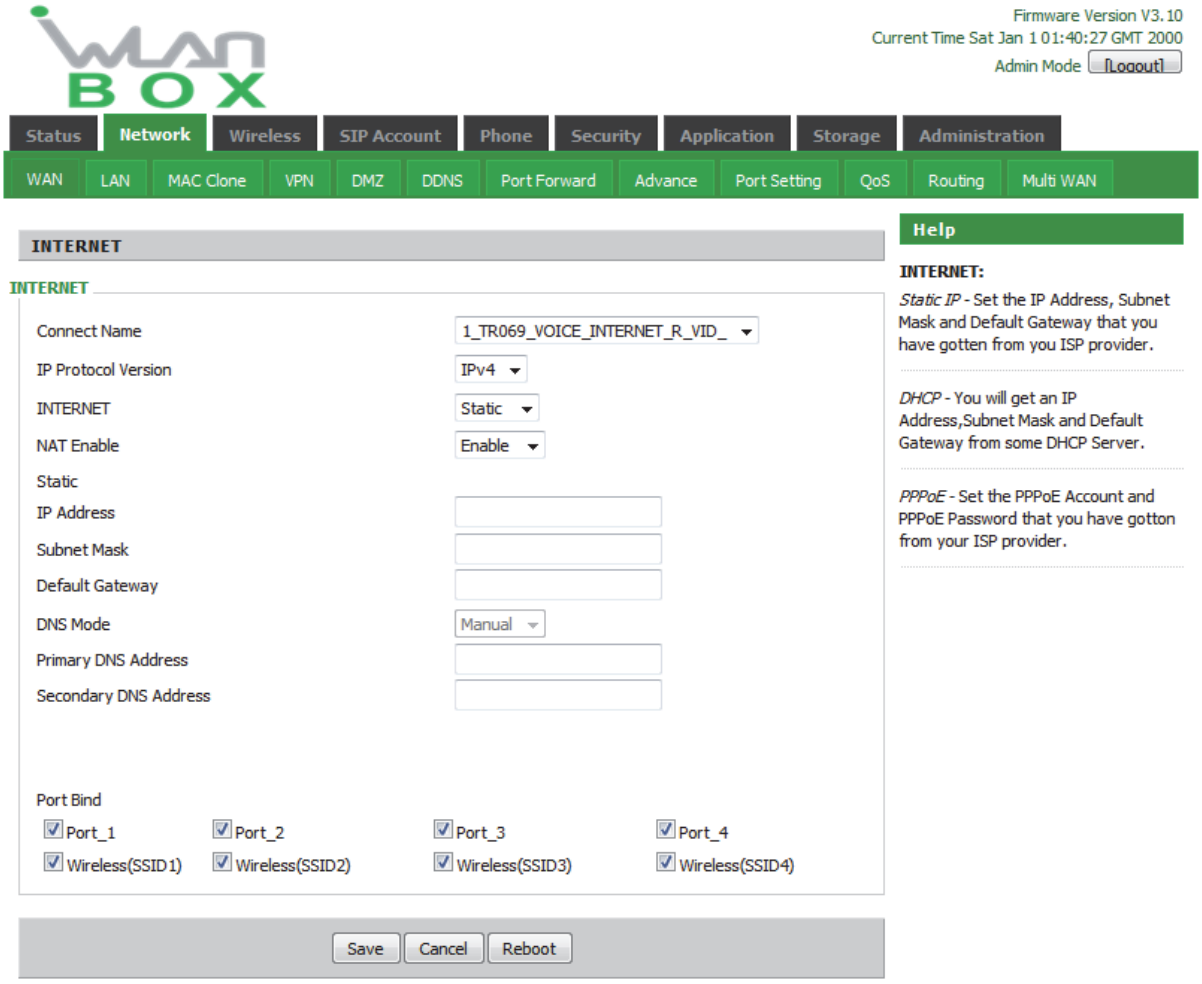



## 4.2 Network

### 4.2.1 WAN

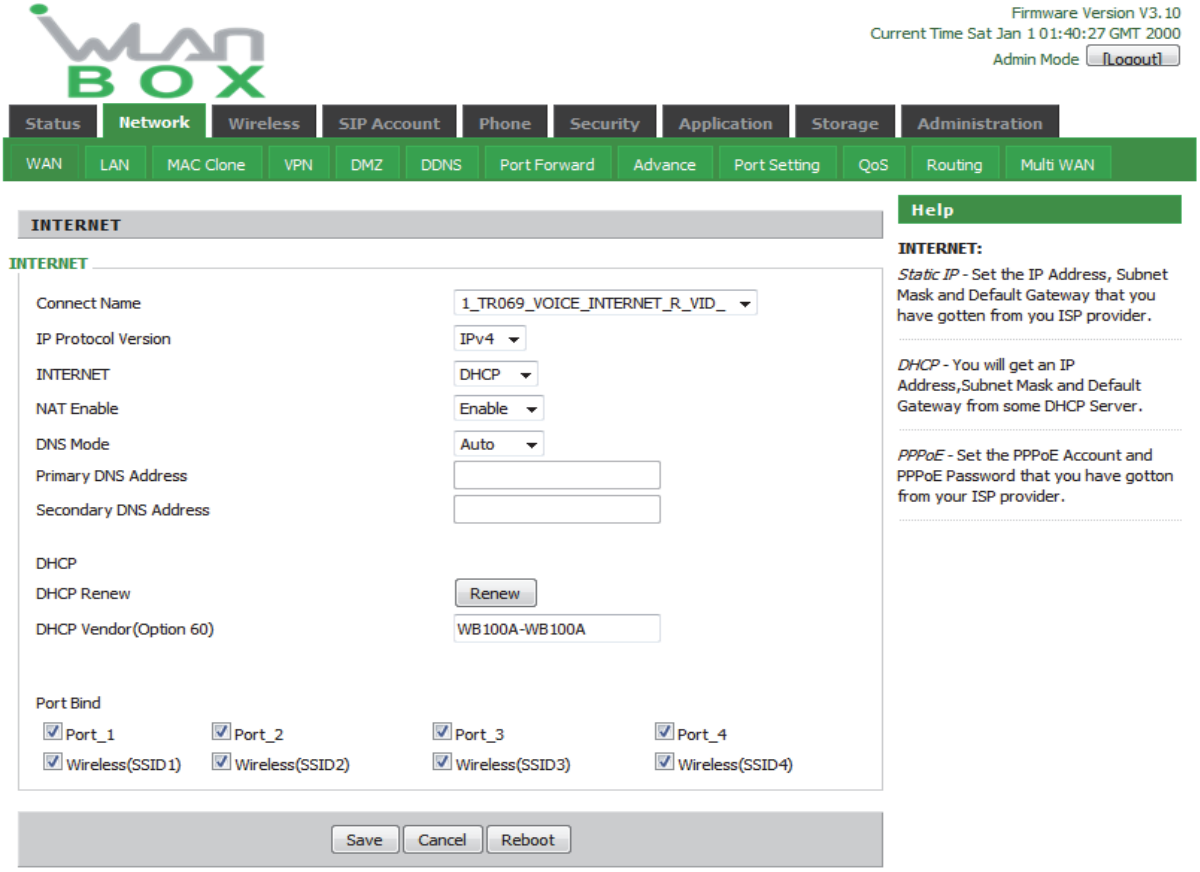
1. Static:

In static mode, user should fill in the values of IP Address, Subnet Mask, Default Gateway, Primary DNS and Second DNS.



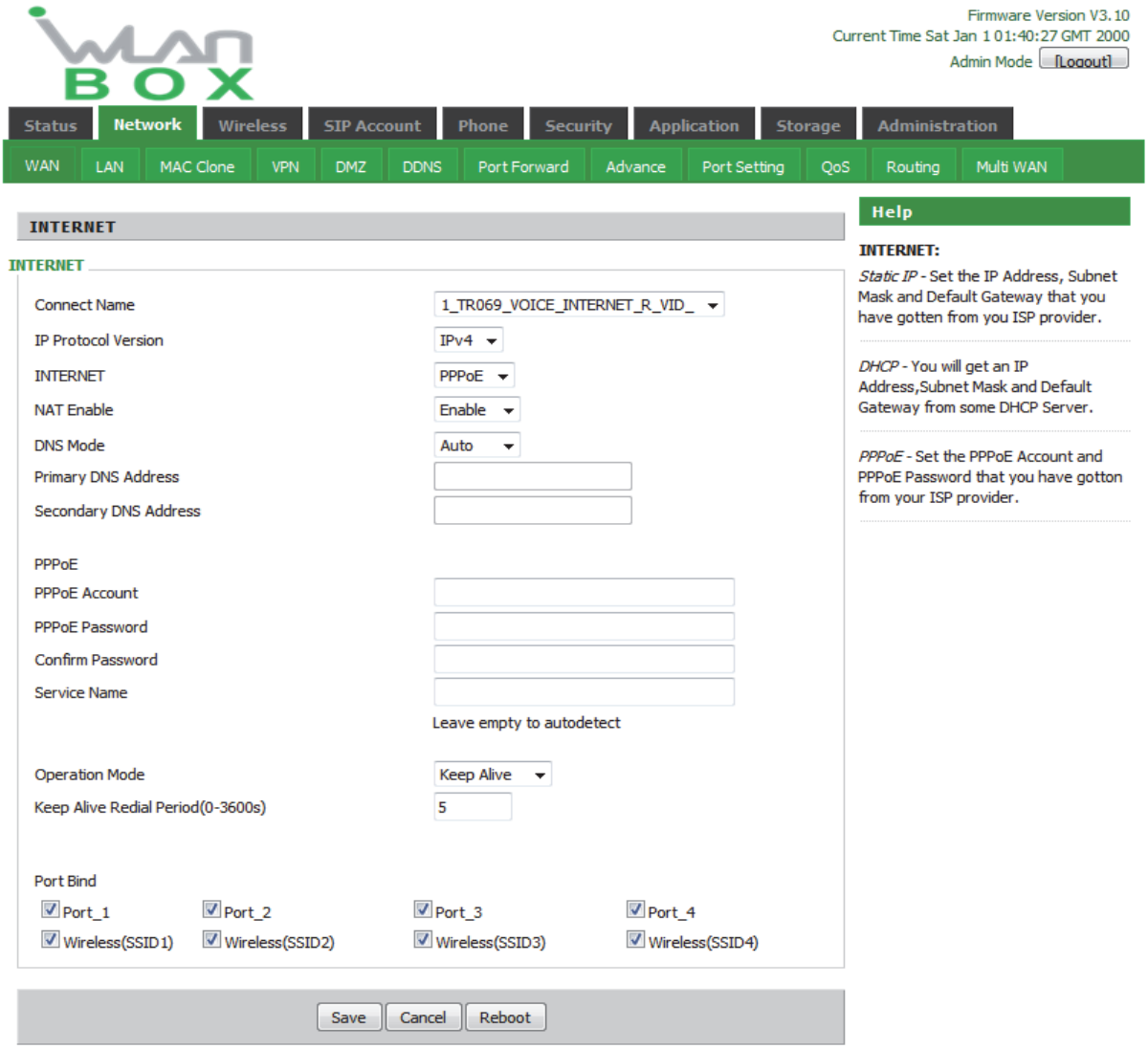

| Field Name | Description |
|---|---|
| **Connect Name** | Use keywords to indicate WAN port service model (the parameters are defined in Network--> multi-WAN page) |
| **IP Protocol Version** | Temporarily only IPv4 |
| **Internet** | Choose Static IP. |
| **Route/Bridge Mode** | Set network working mode, options are route and bridge. |
| **NAT Enable** | This requires multi-WAN port Page settings, please refer to **4.2.7** |
| **DHCP Service Type** | Options are "pass through" "Snooping" and "the native service" |
| **VLAN Mode** | This requires multi-WAN port Page settings, please refer to **4.2.7** |
| **IP Address** | The IP address of Internet port |
| **Subnet Mask** | The subnet mask of Internet port. |
| **Default Gateway** | The default gateway of Internet port. |
| **DNS Mode** | In Static mode, user need set the DNS manually. |
| **Primary DNS Address** | The primary DNS of Internet port. |
| **Secondary DNS Address** | The secondary DNS of Internet port. |
| **Port Bind** | Port bind is used for binding the service for different LAN ports and SSIDs. |

2. DHCP Mode




| Field Name | Description |
|---|---|
| **Connect Name** | Use keywords to indicate WAN1-WAN5 port service model (the parameters are defined in Network--> multi-WAN page) |
| **IP Protocol Version** | Temporarily only one IPv4 option |
| **Internet** | Choose DHCP |
| **Route/Bridge Mode** | Set network working mode, options are route and bridge. |
| **NAT Enable** | This requires multi-WAN port Page settings, please refer to **5.2.7** |
| **VLAN Mode** | This requires multi-WAN port Page settings, please refer to **5.2.7** |
| **DNS Mode** | From the automatic mode is selected and specify two DNS type.<br>• DNS type to Automatic, the home gateway from the DHCP server automatically obtain the preferred DNS and alternate DNS.<br>• DNS type is specified, the user should manually configure the preferred DNS and alternate DNS. |
| **Primary DNS Address** | The primary DNS of Internet port. |
| **Secondary DNS Address** | The secondary DNS of Internet port. |
| **DHCP Renew** | Refresh DHCP IP |
| **DHCP Vendor(Option60)** | Specify DHCP Vendor field Display the vendor and product name |
| **Port Bind** | Port bind is used for binding the service for different LAN ports and SSIDs. |

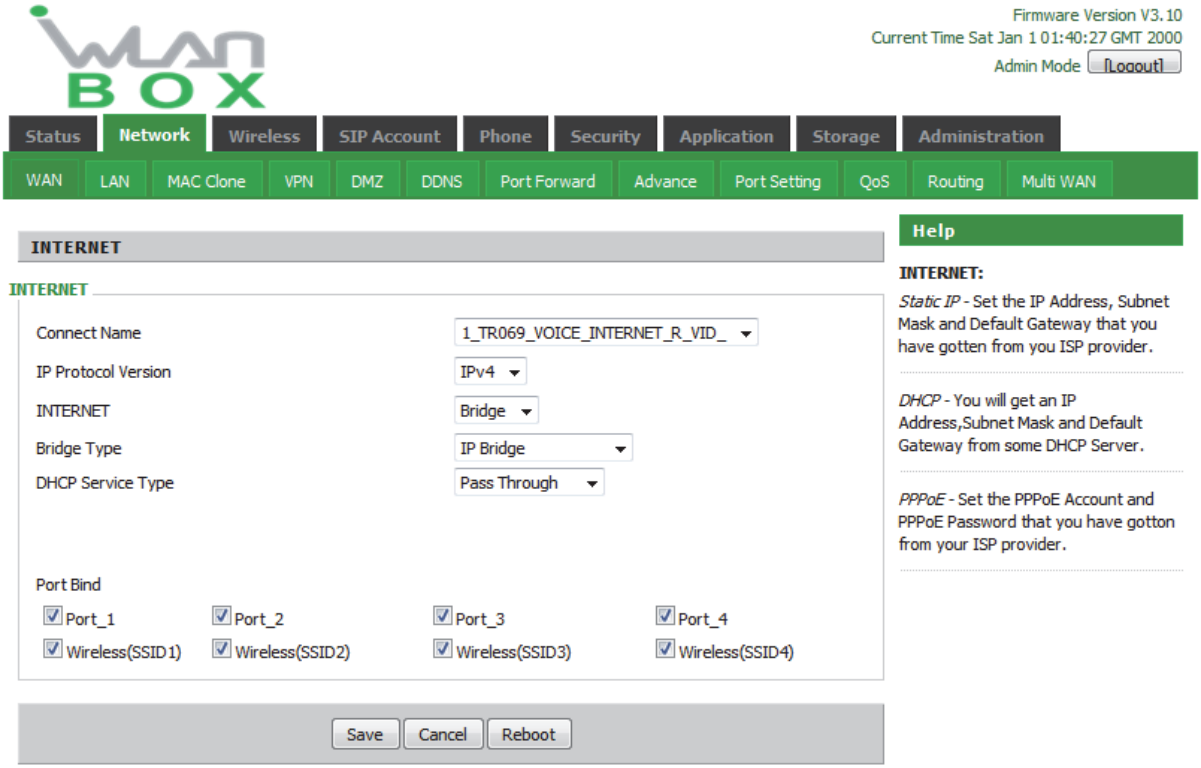
3）PPPOE Mode




| Field Name | Description |
|---|---|
| **Connect Name** | Use keywords to indicate the WAN1~WAN5 service mode (set relevant parameters in the WAN port settings page) |
| **IP Protocol Version** | Currently, only one IPv4 option |
| **INTERNET** | Choose PPPoE. |
| **PPPoE Account** | Assign a valid user name provided by the ISP |
| **PPPoE Password** | Assign a valid password provided by the ISP |
| **Confirm Password** | Enter your PPPoE password again |
| **Operation Mode** | Select the mode of operation, options are Keep Alive, On Demand and Manual:<br>• When the mode is Keep Alive, user need to set the 'keep alive redial period' values range from 0 to 3600s, the default setting is 5 minutes;<br>• When the mode is On Demand, user need to set the 'on demand idle time' value in the range of 0-60 minutes, the default setting is 5 minutes; |

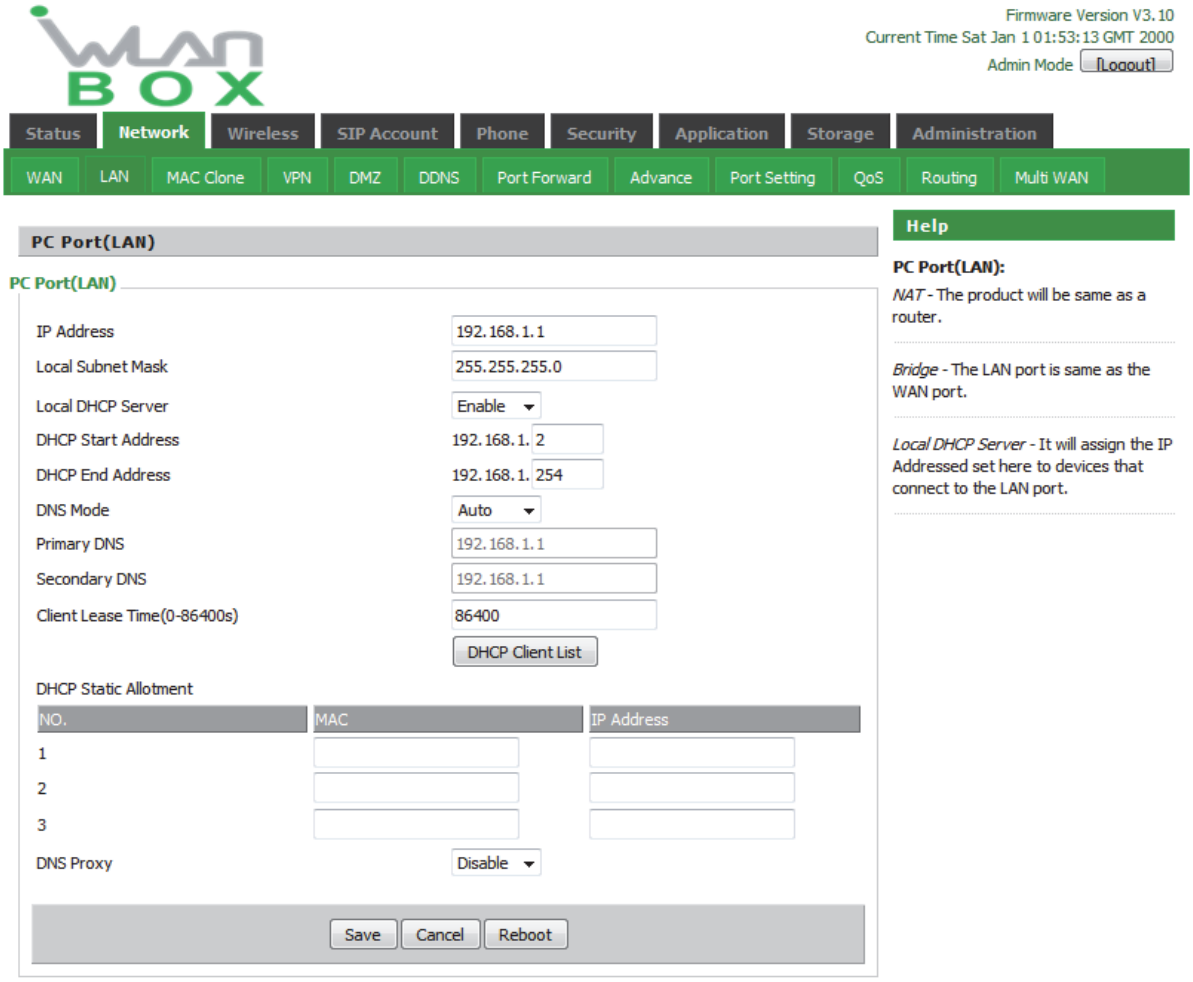
| | |
|---|---|
| | • When the mode is Manual, no need to do other settings. |
| **Keep Alive Redial Period** | Set the interval to send Keep Alive |
| **On Demand Idle Time** | Set On demand transmission time interval |
| **Port Bind** | Port bind is used for binding the service for different LAN ports and SSIDs. |

4）Bridge Mode




| **Field** | **Name Description** |
|---|---|
| **Connect Name** | Use keywords to indicate the WAN1~WAN5 service mode (set relevant parameters in the WAN port settings page) |
| **IP Protocol Version** | Currently, WB100A only supports IPv4 mode. |
| **INTERNET** | Bridge: If user make the option be Bridge mode, the PC which is connected to WB100A's LAN port use PPPoE to connect Internet. |
| **Port Bind** | Port bind is used for binding the service for different LAN ports and SSIDs. |

## 4.2.2 LAN

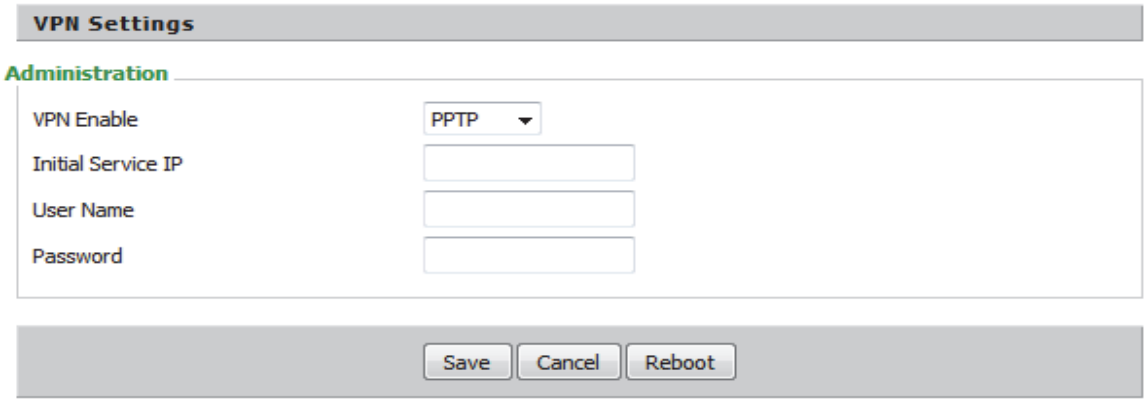



| Field Name | Description |
|---|---|
| **IP Address** | Enter the IP address of the router on the local area network, all the IP addresses of the computers which are in the router's LAN must be in the same network segment with this address, and the default gateway of the computers must be this IP address. (The default is 192.168.1.1) |
| **Local Subnet Mask** | Enter the subnet mask to determine the size of the network (default is 255.255.255.0/24) |
| **Local DHCP Server** | If or not enable Local DHCP Server |
| **DHCP Start Address** | Enter a valid IP address as a starting IP address of the DHCP server, and if the router's LAN IP address is 192.168.1.1, starting IP address can be 192.168.1.2 or greater, but should be less than the ending IP address. |
| **DHCP End Address** | Enter a valid IP address as an end IP address of the DHCP server. |
| **DNS Mode** | Select DNS mode, options are Auto and Manual:<br>• When DNS mode is Auto, the device under LAN port will automatically obtains the preferred DNS and alternate DNS.<br>• When DNS mode is Manual, the user should manually configure the preferred DNS and alternate DNS |

| | |
|---|---|
| **Primary DNS** | Enter the preferred DNS address. |
| **Secondary DNS** | Enter the secondary DNS address. |
| **Client Lease Time** | This option defines how long the address will be assigned to the computer within the network. In that period, the server does not assign the IP address to the other computer. |
| **DNS Proxy** | Enable or disable; If enabled, the device will forward the DNS request of LAN-side network to the WAN side network |

## 4.2.3 VPN

A VPN is a kind of technology which establish a private network based on the public network. VPN network connection between any two nodes does not require the end to end physical connection as the traditional private network; it is structured on the network platform provided by the public network services, the user dhome gateway are transmitted in the logical link. Through VPN technology, users can establish connection between any two devices which are connected to public network and transmit dhome gateway.



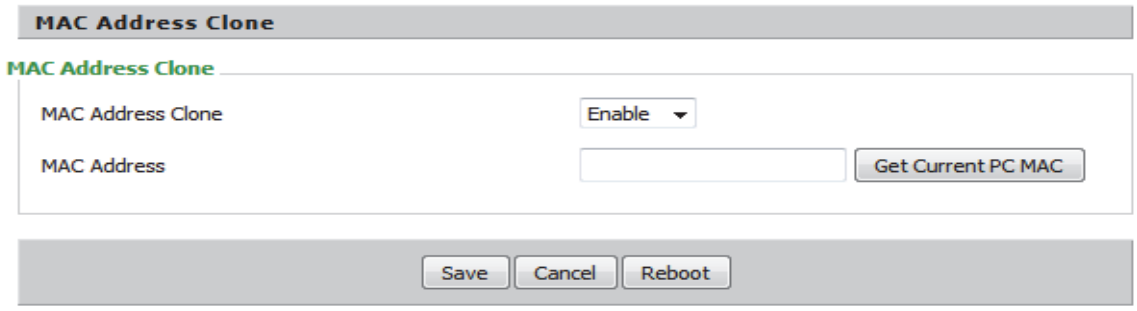

| Field | Name Description |
|---|---|
| **VPN Enable** | If or not enable VPN.If enable, you can select PPTP and L2TP mode VPN. |
| **Initial Service IP** | Fill in the VPN server IP address |
| **User Name** | Fill in the authentication username |
| **Password** | Fill in the authentication password |

## 4.2.4 MAC Clone

MAC address is the hardware address of the network device. Sometimes the network provider may set the network device's MAC bound to the network accounts. So when the user uses a new home gateway may not pass vendor certifications. In this case, the user can use the MAC clone function to clone your computer's physical address to the device's Internet port.

MAC address is the important parameter of the network device, the user should ensure that the MAC is correct, or the device cannot be used normally.

If you accidentally make the MAC address wrong, the user can login the web via LAN port. And then cloning the right MAC or resume the default settings.

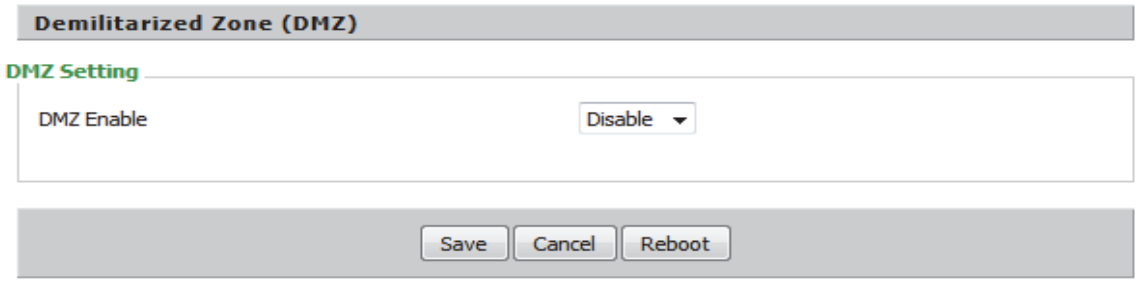



Enabling MAC address cloning

1. Press the button Get Current PC MAC gets PC's MAC address
2. Press the button Save to save your changes if users don't want to use a MAC clone, press the button Cancel to cancel the changes
3. Press the button Reboot to make the changes effective.

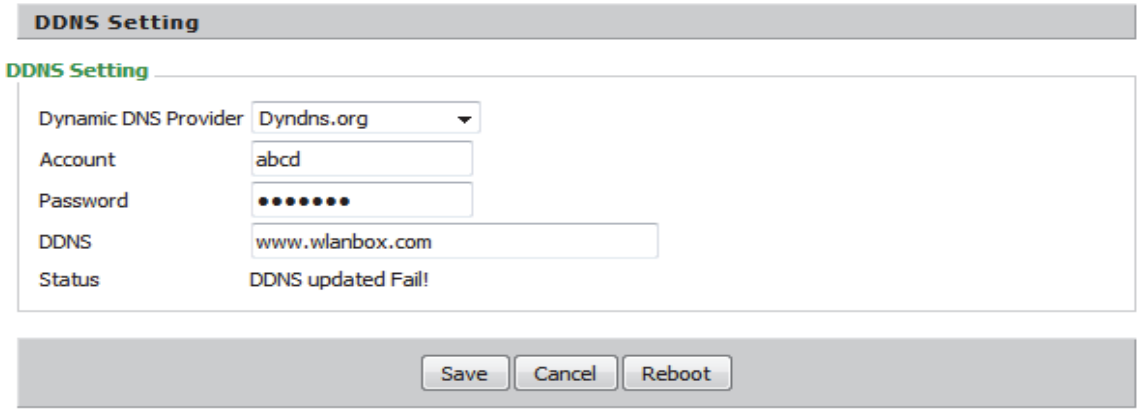
## 4.2.5 DMZ

Set the DMZ host in the local area network, the host will be fully exposed to the wide area network; unrestricted two-way communication can be achieved. Adding clients to the DMZ may bring local network insecurity, usually we do not recommend using this.



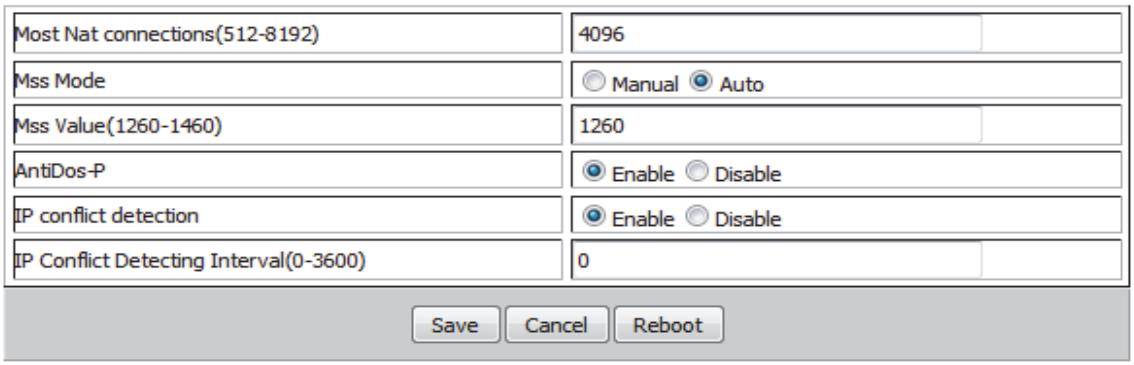

| Field Name | Decryption |
|---|---|
| **DMZ Enable** | If or not enable DMZ |
| **DMZ Host IP Address** | Used to enter the DMZ host IP address |

## 4.2.6 DDNS



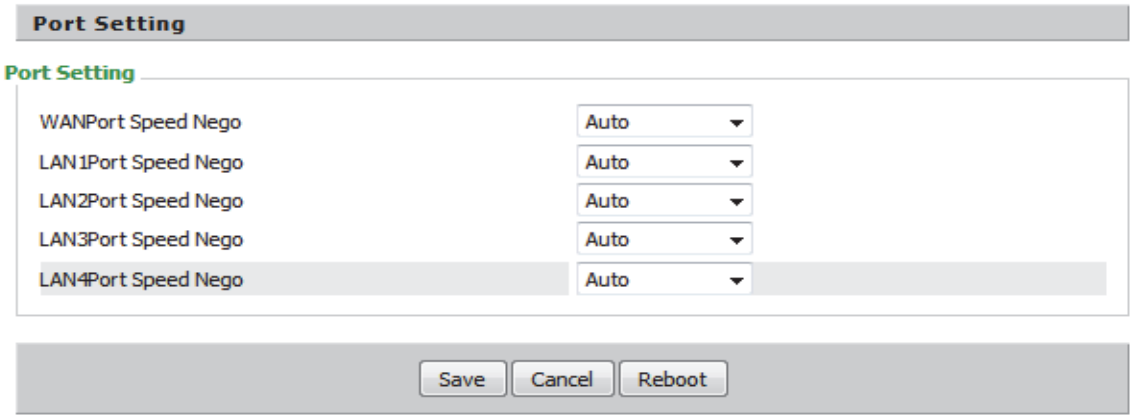
| Field Name | Description |
|---|---|
| **Dynamic DNS Provider** | DDNS is enabled and select a DDNS service provider |
| **Account** | Enter the DDNS service account |
| **Password** | Enter the DDNS service account password |
| **DDNS** | Enter the DDNS domain name or IP address |
| **Status** | See if DDNS is successfully upgraded |

## 4.2.7 Advance




| Field | Name Description |
|---|---|
| **Most Nat connections** | The largest value which the WB100A can provide |
| **Mss Mode** | Choose Mss Mode from Manual and Auto |
| **Mss Value** | Set the value of TCP |
| **AntiDos-p** | You can choose to enable or prohibit |
| **IP conflict detection** | Select enable if enabled, phone IP conflict will have tips or prohibit; |
| **IP conflict Detecting Interval** | Detect IP address conflicts of the time interval |

## 4.2.8 Port Setting

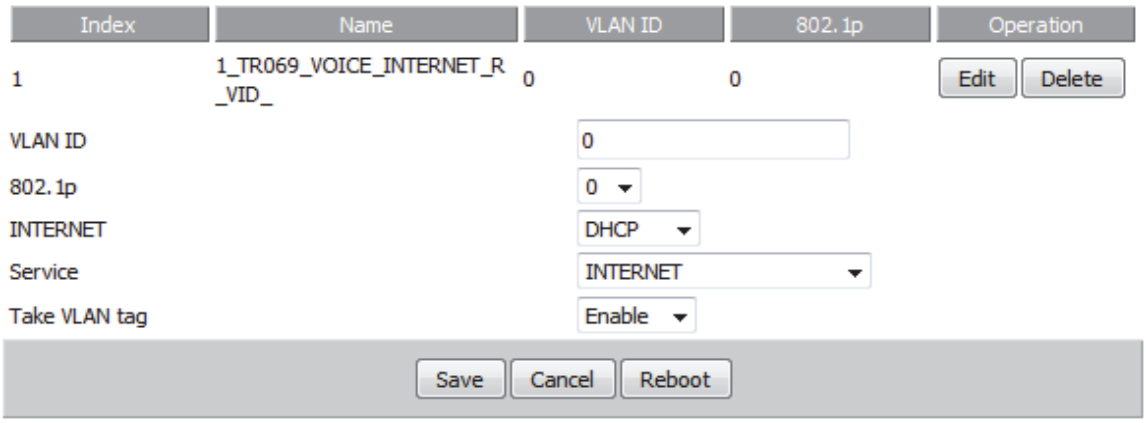



| Field Name | Description |
|---|---|
| **WAN Port Speed Nego** | Auto-negotiation, options are Auto, 100M full, 100M half-duplex, 10M half and full, select port speed negotiation supported by methods. |

| | |
|---|---|
| **LAN1~LAN4Port Speed Nego** | Auto-negotiation, options are Auto, 100M full, 100M half, 10M half and 10M full, select port speed negotiation methods. |

## 4.2.9 Multi WAN

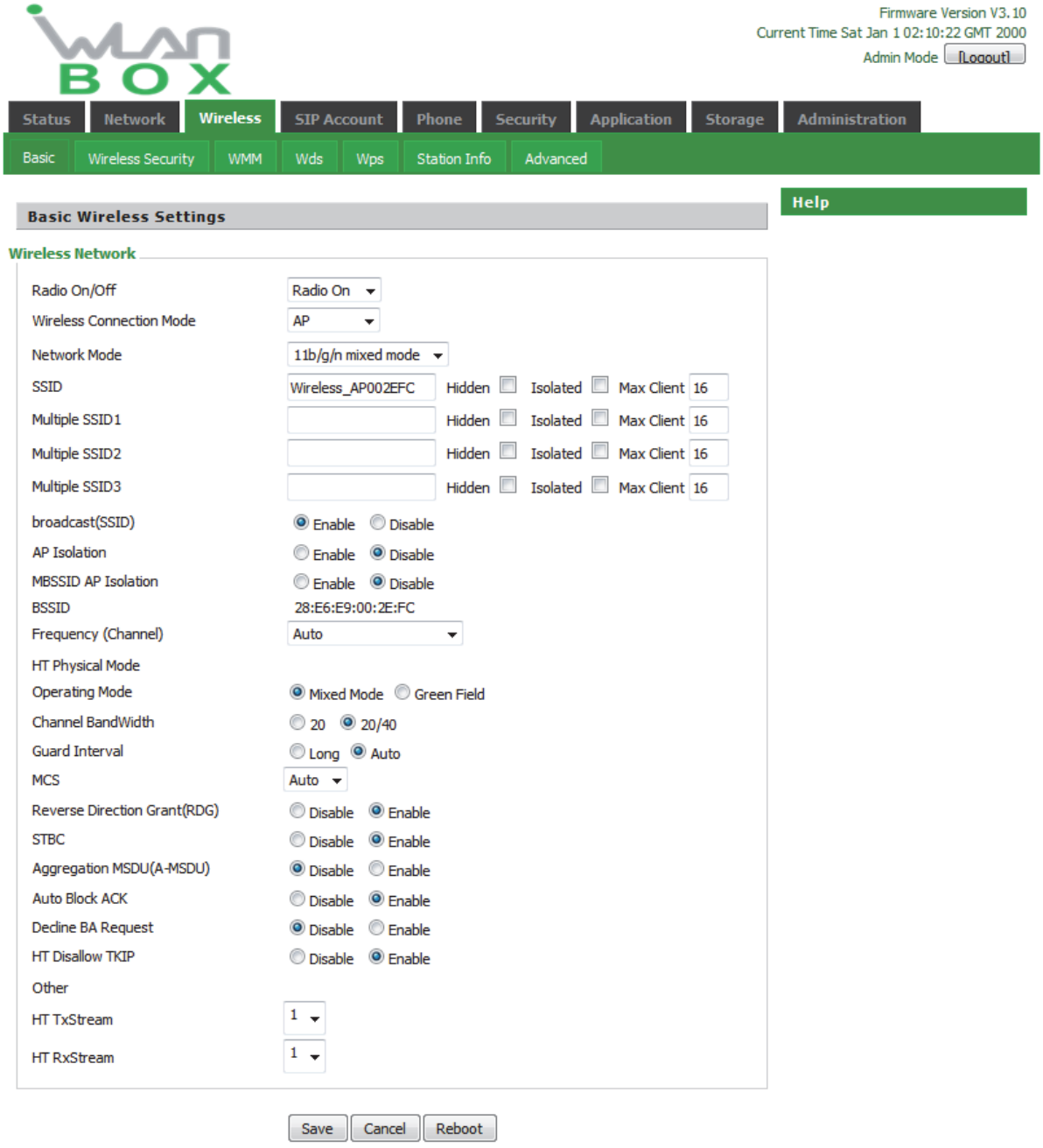
WB100A support multi WAN function, user can set different vlans on WAN port.




| **Field Name** | **Description** |
|---|---|
| **VLAN ID** | Configure VLAN ID |
| **Route/Bridge Mode** | Select Route mode or Bridge mode. |
| **Service** | There are these options VOICE, TR069, INTERNET, TR069-INTERNET, TR069-VOICE, and VOICE-INTERNET, and TR069-INTERNET-VOICE, and Other |
| **Take VLAN tag** | Whether or not carry VLAN tag |

# 4.3 Wireless

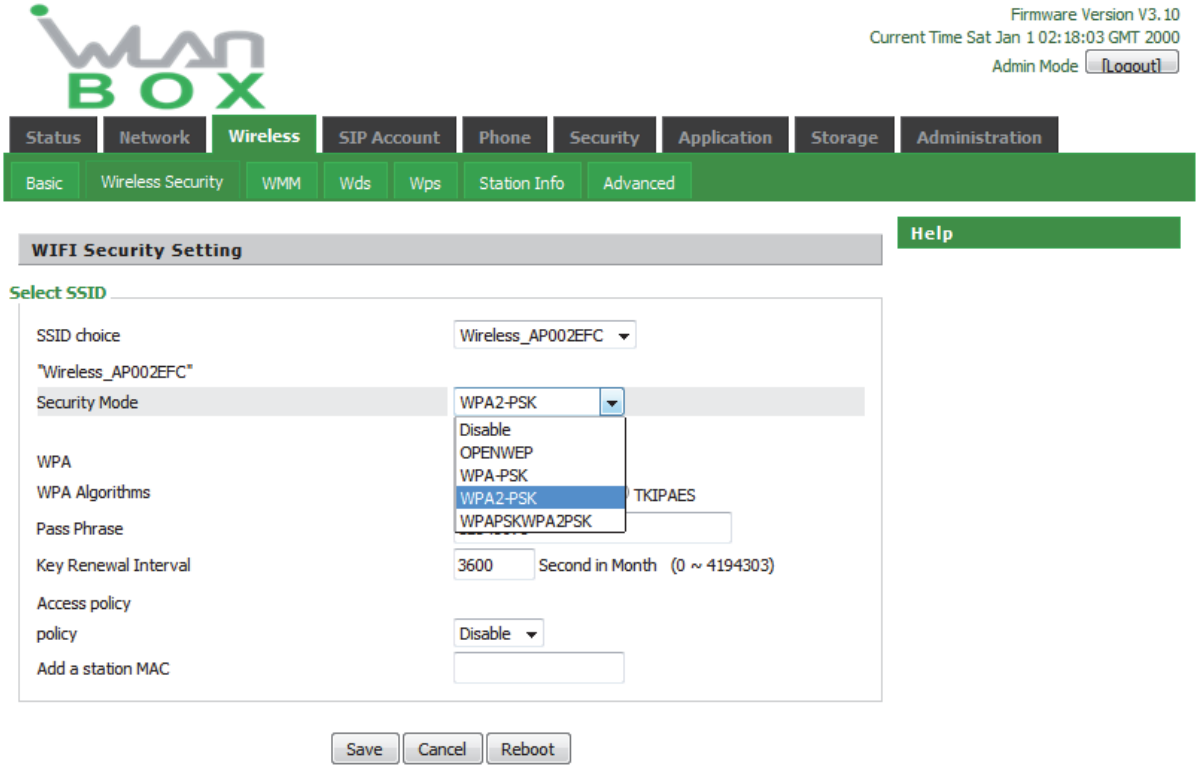
## 4.3.1 Basic




| Field Name | Description |
|---|---|
| **Radio on/off** | Click the button to enable or disable wireless. |
| **Wireless connection mode** | According to the wireless client type, select one of these modes. Default is 11b/g/n mixed mode |
| **SSID** | It is the basic identity of wireless LAN. SSID can be any alphanumeric or a combination of special characters. It will appear in the wireless network access list. |

| | |
|---|---|
| **Multiple SSID1~SSID3** | WB100A supports multiple SSIDs. |
| **Hidden** | After the item is checked, the SSID is no longer displayed in the search for the Wi-Fi wireless network connection list |
| **Broadcast(SSID)** | After initial State opening, the device broadcasts the SSID of the router to wireless network |
| **AP Isolation** | If AP isolation is enabled, the clients of the AP cannot access each other. |
| **MBSSID AP Isolation** | AP isolation among the devices which are not belong to this AP and along to, when the option is enabled, the devices which do not belong to this AP cannot access the devices which are within the AP. |
| **BSSID** | A group of wireless stations and a WLAN access point (AP) consists of a basic access device (BSS), each computer in the BSS must be configured with the same BSSID, that is, the wireless AP logo. |
| **Frequency (Channel)** | You can select Auto Select and channel 1/2/3/4/5/6/7/8/9/10/11. |
| **HT Physical Mode/ Operating Mode** | 1. Mixed Mode: In this mode, the previous wireless card can recognize and connect to the Pre-N AP, but the throughput will be affected<br>2. Green Field: high throughput can be achieved, but it will affect backward compatibility, and security of the system |
| **Channel Bandwidth** | Select channel bandwidth, default is 20MHz and 20/40MHz. |
| **Guard Interval** | The default is automatic, in order to achieve good BER performance, you must set the appropriate guard interval |
| **MCS** | Position control signal, options are 0 to 32, the default is automatic |
| **Reverse Direction（RDG）** | You can choose to enable or disable this privilege |

## 4.3.2 Wireless Security Setting




**SSID choice** Select a SSID from SSID, multi SSID1, multi SSID2. multi-SSID3.

**Security Mode** Select an appropriate encryption mode to increase the security and privacy features of wireless dhome gateway.

Select a different encryption mode, the web interface will be different, user can configure the corresponding parameters under the mode you select. Here are some common encryption method:

**OPENWEP,**

A handshake way of WEP encryption, encryption via the WEP key: WEP represents Wired Equivalent Privacy, which is a basic encryption method.

**Security Mode** This is used to select one of the 4 WEP keys, key settings on the clients should be the same with this when connecting.

**WEP Keys** Set the WEP key. A-64 key need 10 Hex characters or 5 ASCII characters; choose A-128 key need 26 Hex characters or 13 ASCII characters.

**WPA-PSK,**

the router will use WPA way which is based on the shared key-based mode:

**WPA Algorithms** This item is used to select the encryption of wireless dhome gateway algorithms, options are TKIP, AES and TKIPAES.

**Pass Phrase** Setting up WPA-PSK security password.

**Key Renewal Interval** Set the key scheduled update cycle, default is 3600s.

**WPA2-PSK,**

the router will be based on shared key WPA2 modes:

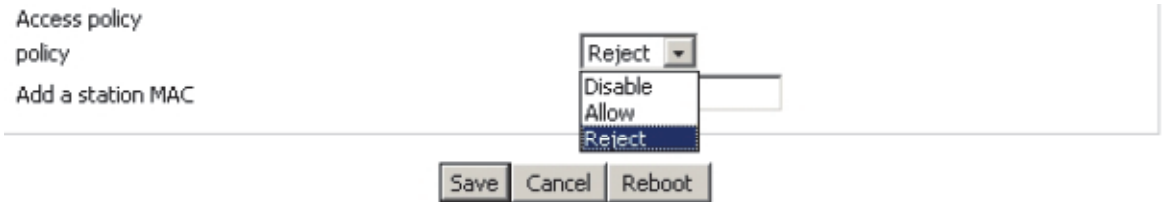
| | |
|---|---|
| **WPA Algorithms** | This item is used to select the security algorithm for encryption of wireless dhome gateway, options are TKIP, AES, TKIPAES three |
| **Pass phrase** | Setting up WPA2-PSK security password |
| **Key Renewal Interval** | Set the key scheduled update cycle, default is 3600s |

**WPAPSKWPA2PSK**

manner is consistent with WPA2PSK settings. WPA-PSK/WPA2-PSK WPA/WPA2 security type is actually a simplified version, which is based on the WPA shared key mode, higher security setting is also relatively simple, suitable for ordinary home users and small businesses.

| | |
|---|---|
| **WPA Algorithms** | The dhome gateway is used to select the wireless security encryption algorithm options are TKIP, AES, TKIP / AES. 11N mode does not support TKIP algorithms. |
| **Pass Phrase** | Set WPA-PSK/WPA2-PSK security code |
| **Key Renewal Interval** | Set the key scheduled update cycle, default is 3600s |

Wireless Access Policy:



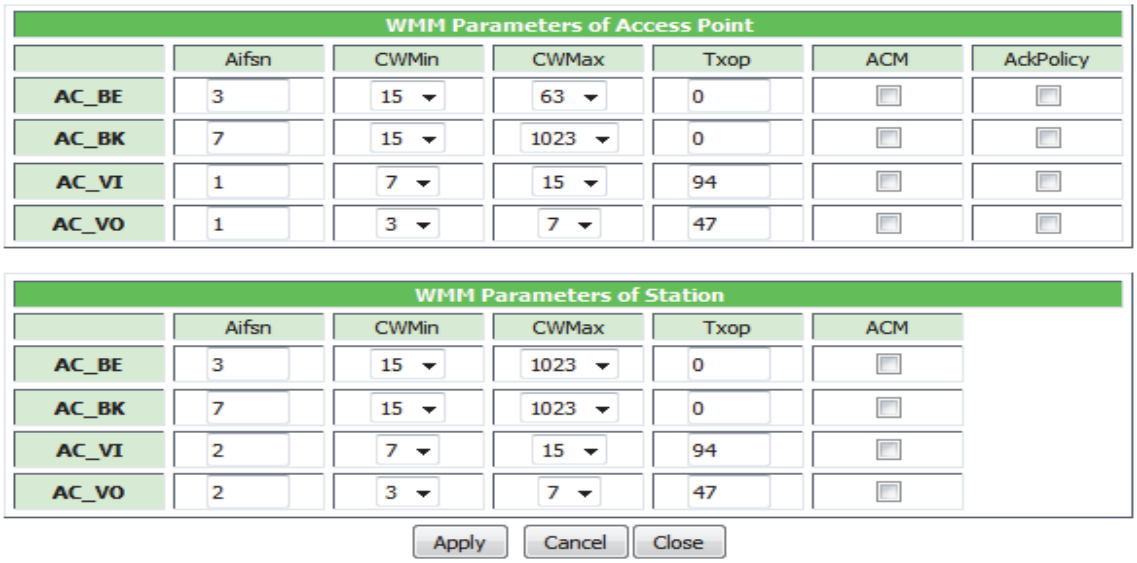

| **Field Name** | **Description** |
|---|---|
| **Access policy** | Wireless access control is used to allow or prohibit the specified client to access to your wireless network based on the MAC address. |
| **Policy** | Prohibition: disable wireless access control policy; allow: only allow the clients in the list to access, rejected: block the clients in the list to access. |
| **Add a station MAC** | Enter the MAC address of the clients which you want to allow or prohibit |

Example: Prohibit the device whose wireless network card MAC address is 00:1F: D0: 62: BA: FF's to access the wireless network, and allow other computers to access the network.

Implementation: As shown, the Policy is Reject, add 00:1F: D0: 62: BA: FF to the MAC, click Save and reboot the device settings to take effect.

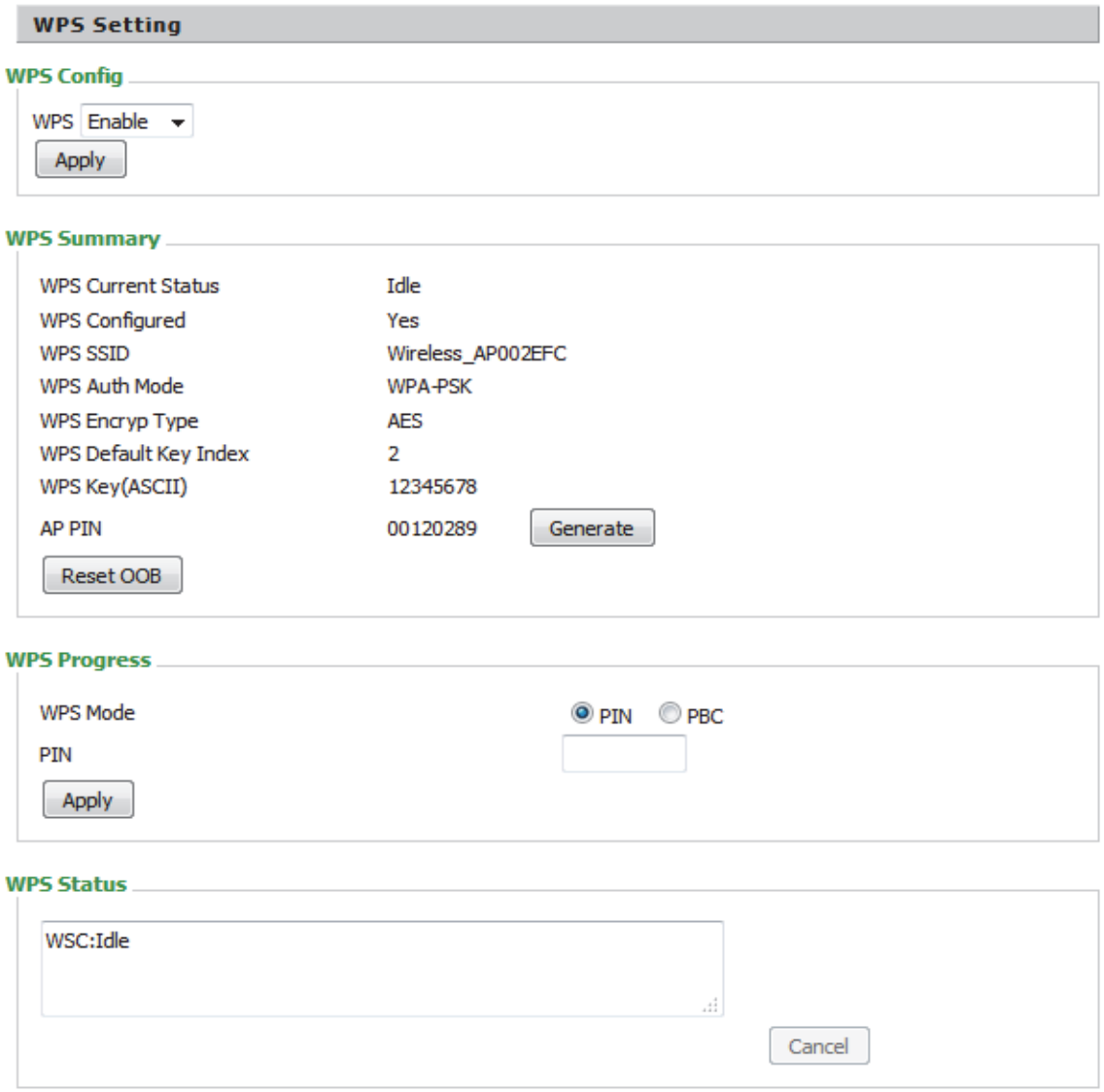
### 4.3.3 Wireless MultiMedia

WMM (Wireless MultiMedia) is the QoS certificate of Wi-Fi Alliance (WFA). This provides you to configure the parameters of wireless multimedia; VMM allows wireless communication to define a priority according to the dhome gateway type. To make VMM effective, the wireless clients must also support VMM.



## 4.3.4 Wi-Fi Protected Setup (WPS)

WPS is the newest Wi-Fi security settings(Wi-Fi Protected Setup), which is launched by Wi-Fi Alliance, this standard is mainly introduced to solve the problems that the steps of encrypting and authenticating the wireless network are too complicated, and these problems has long been there. By using the WPS button on WB100A, we can freely enjoy quick encrypting the wireless network dhome gateway, protecting illegal users from invading. On one hand, this can ensure the security of wireless networks, on the other hand, we can encrypt much easier.




| Field | Name Description |
|---|---|
| **WPS Setting** | If or not enable WPS function |
| **WPS Summary** | Display the current status of WPS, including current state, SSSID name, authentication methods, encryption type and the PIN code of this AP. |
| **Generate** | Generate a new PIN code |
| **Reset OOB** | WB100A uses default security policy to allow other non-WPS users to access and apply. |

**WPS Mode**

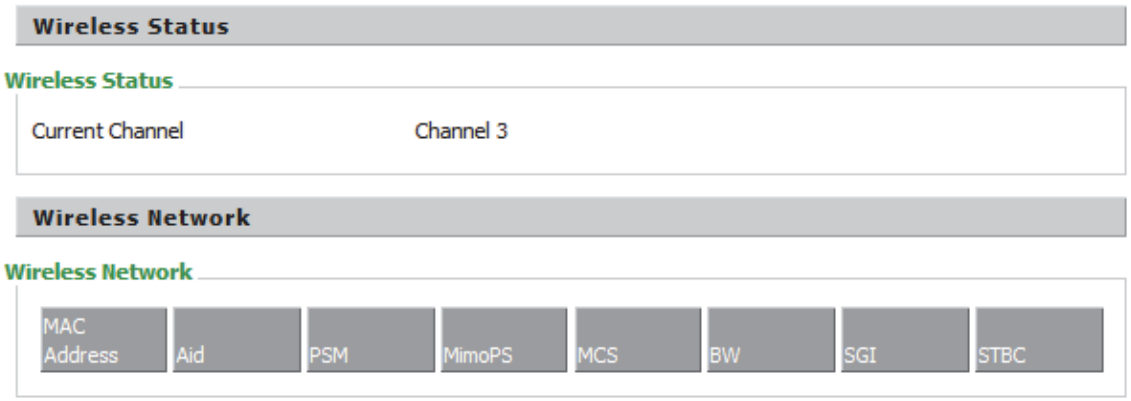
PIN：Enter the PIN code of the wireless device which accesses to this LAN in the following option, and press apply. Then WB100A begins to send signals, turn on the PIN accessing method on the clients, and then it can access the wireless AP automatically.
PBC：There are two ways to start PCB mode, user can press the PCB button directly on the device, or select PCB mode on the software and apply. Users can activate WPS connection in WPS mode through these two methods, only when the clients choose PCB access, the clients can connect the AP automatically.

**WPS Status**

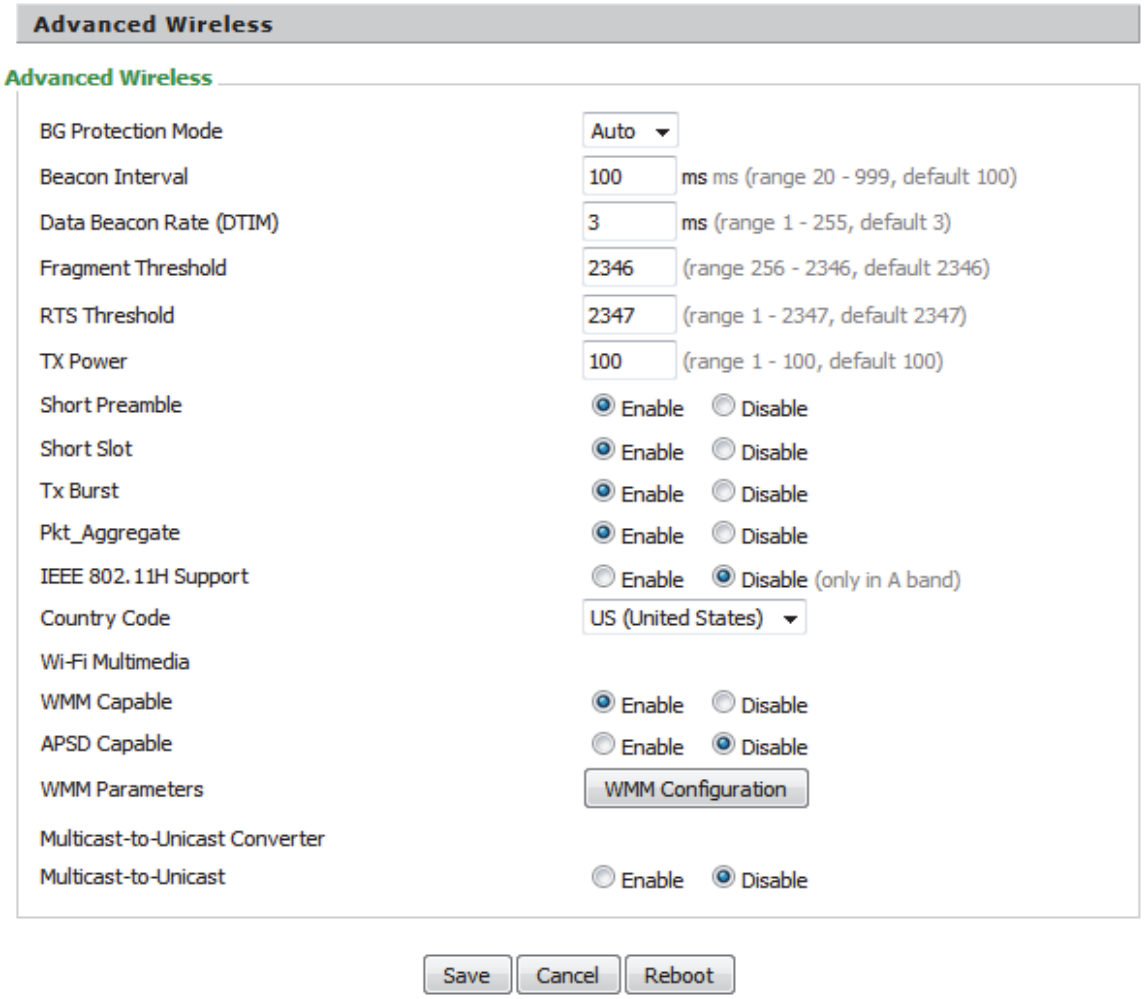
WPS shows status in three ways:
WSC: Idle
WSC: Start WSC Process(begin to send messages)
WSC: Success; this means clients have accessed the AP successfully,
WPS connects well.

## 4.3.5 Station info

This page shows information about the AP and user which are connected to the AP.



## 4.3.6 Advance Wireless



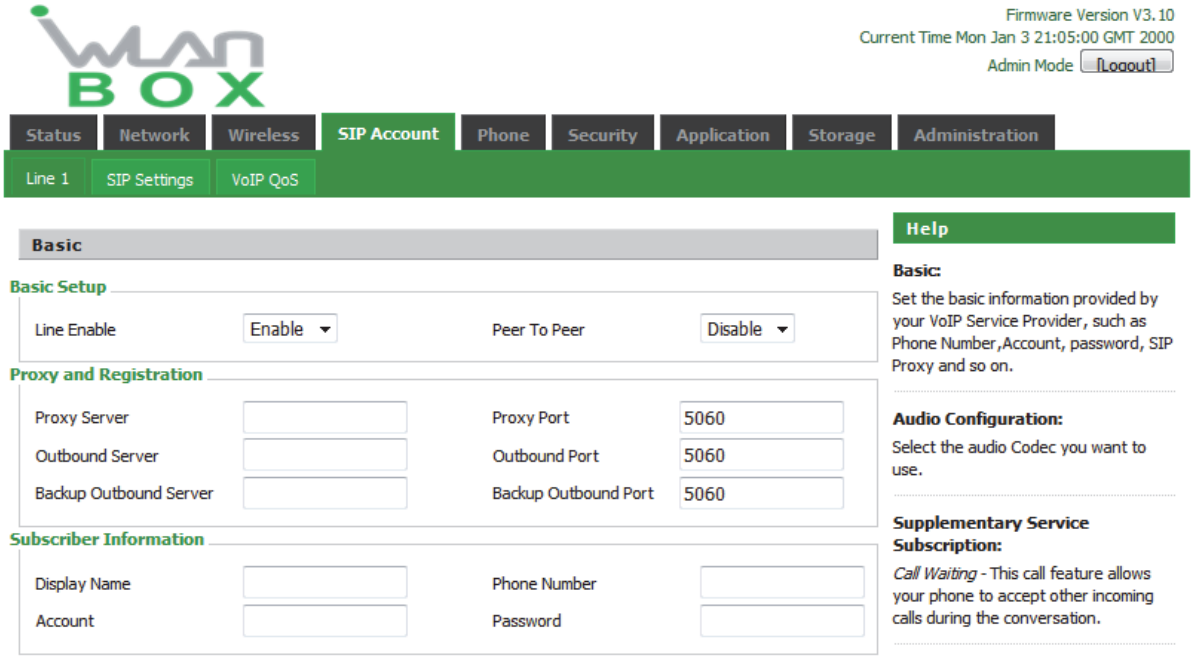

| Field | Name Description |
|---|---|
| **BG Protection Mode** | Select G protection mode, options are on, off and automatic. |
| **Beacon Interval** | The interval of sending a wireless beacon frame, within this range, it will send a beacon frame for the information of the surrounding radio network. |
| **Dhome gateway Beacon Rate** | Specify the interval of transmitting the indication message, it is a kind of cut down operation, and it is used for informing the next client which is going to receive broadcast multi-cast. |
| **Fragment Threshold** | Specify the fragment threshold for the packet, when the length of the packet exceeds this value, the packet will be divided into multiple packets. |
| **RTS Threshold** | Specify the packet RTS threshold, when the packet exceeds this value, the router will send RTS to the destination site consultation |
| **TX Power** | Define the transmission power of the current AP, the greater it is, the stronger the signal is. |

| | |
|---|---|
| **Short Preamble** | Default is enable, WB100A system is not compatible with traditional IEEE802.11, the operation rate can be 1,2Mpbs |
| **Short Slot** | If or not enable short slot, default is enable, it is helpful in improving the transmission rate of wireless communication. |
| **Tx Burst** | One of the features of MAC layer, it is used to improve the fairness for transmitting TCP. |
| **Pkt_Aggregate** | It is a mechanism that is used to enhance the LAN, in order to ensure that the dhome gateway packets are sent to the destination correctly. |
| **IEEE802.11H support** | If or not enable IEEE802.11H Support, default is disable. |
| **Country Code** | Select country code, options are CN, US, JP, FR, TW, IE, HK and NONE. |
| **WMM Capable** | If or not enable WMM. WMM take effects when it is enabled. |
| **APSD Capable** | After enable this, it may affect wireless performance, but can play a role in energy-saving power |
| **WMM Parameters** | Press , the webpage will jump to the configuration page of Wi-Fi multimedia. |
| **Multicast-to-Unicast** | If or not enable Multicast-to-Unicast, by default, it is disabled, you can enable it. |

# 4.4 SIP Account

## 4.4.1 Line 1

In this webpage, user can configure the information on Line 1, including the following 4 parts: Basic, Audio Configuration, Supplementary Service Subscription and Advanced.

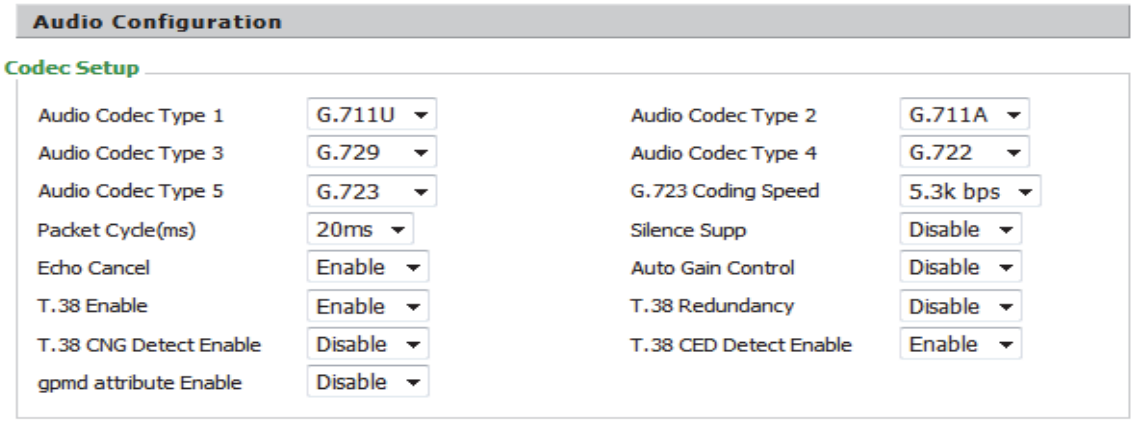


1) Basic

Set the basic information provided by your VOIP Service Provider, such as Phone Number, Account, password, SIP Proxy and so on.

| Field Name | Description |
|---|---|
| **Line Enable** | If or not enable the line. |
| **Peer To Peer** | If or not enable PEER to PEER.<br>If enable, SIP-1 will not send register request to SIP server; but in Status/ SIP Account Status webpage, Status is Registered; lines 1 can dial out, but the external line number cannot dialed line1. |
| **Proxy Server** | The IP address or the domain of SIP Server |
| **Outbound Server** | The IP address or the domain of Outbound Server |
| **Backup Outbound Server** | The IP address or the domain of Backup Outbound Server |
| **Proxy port** | SIP Service port, default is 5060 |
| **Outbound Port** | Outbound Proxy's Service port, default is 5060 |
| **Backup Outbound Port** | Backup Outbound Proxy's Service port, default is 5060 |
| **Display Name** | The number will be displayed on LCD |
| **Phone Number** | Enter telephone number provided by SIP Proxy |
| **Account** | Enter SIP account provided by SIP Proxy |
| **Password** | Enter SIP password provided by SIP Proxy |

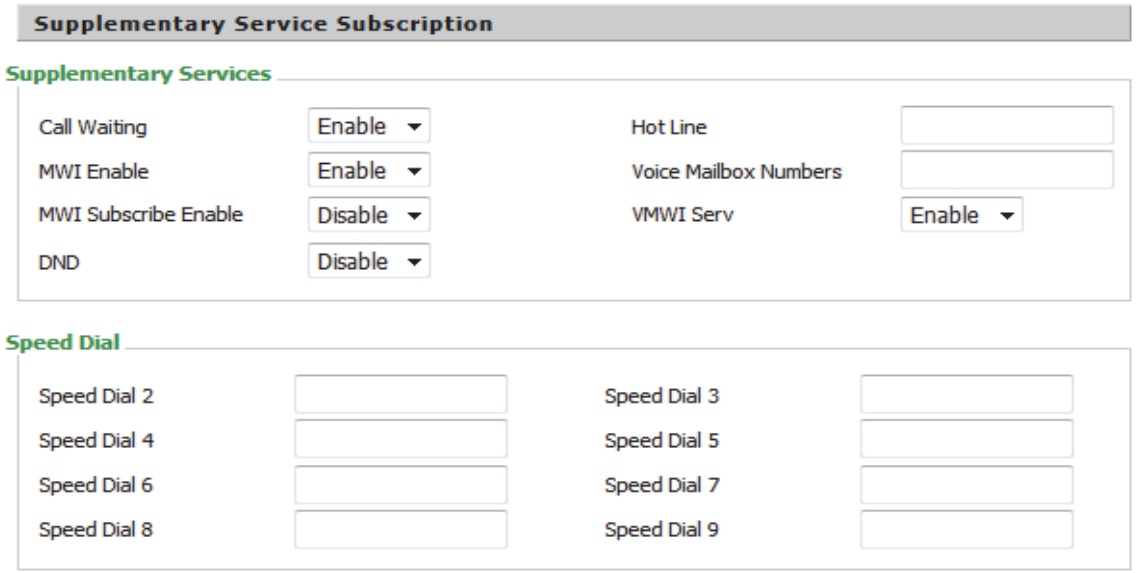
2) Audio Configuration




| Field Name | Description |
|---|---|
| **Audio Codec Type1** | Choose the audio codec type from G.711U, G.711A, G.722, G.729, G.723 |
| **Audio Codec Type2** | Choose the audio codec type from G.711U, G.711A, G.722, G.729, G.723 |
| **Audio Codec Type3** | Choose the audio codec type from G.711U, G.711A, G.722, G.729, G.723 |
| **Audio Codec Type4** | Choose the audio codec type from G.711U, G.711A, G.722, G.729, G.723 |
| **Audio Codec Type5** | Choose the audio codec type from G.711U, G.711A, G.722, G.729, G.723 |
| **G.723 Coding Speed** | Choose the speed of G.723 from 5.3kbps and 6.3kbps |
| **Packet Cycle** | The RTP packet cycle time, default is 20ms |

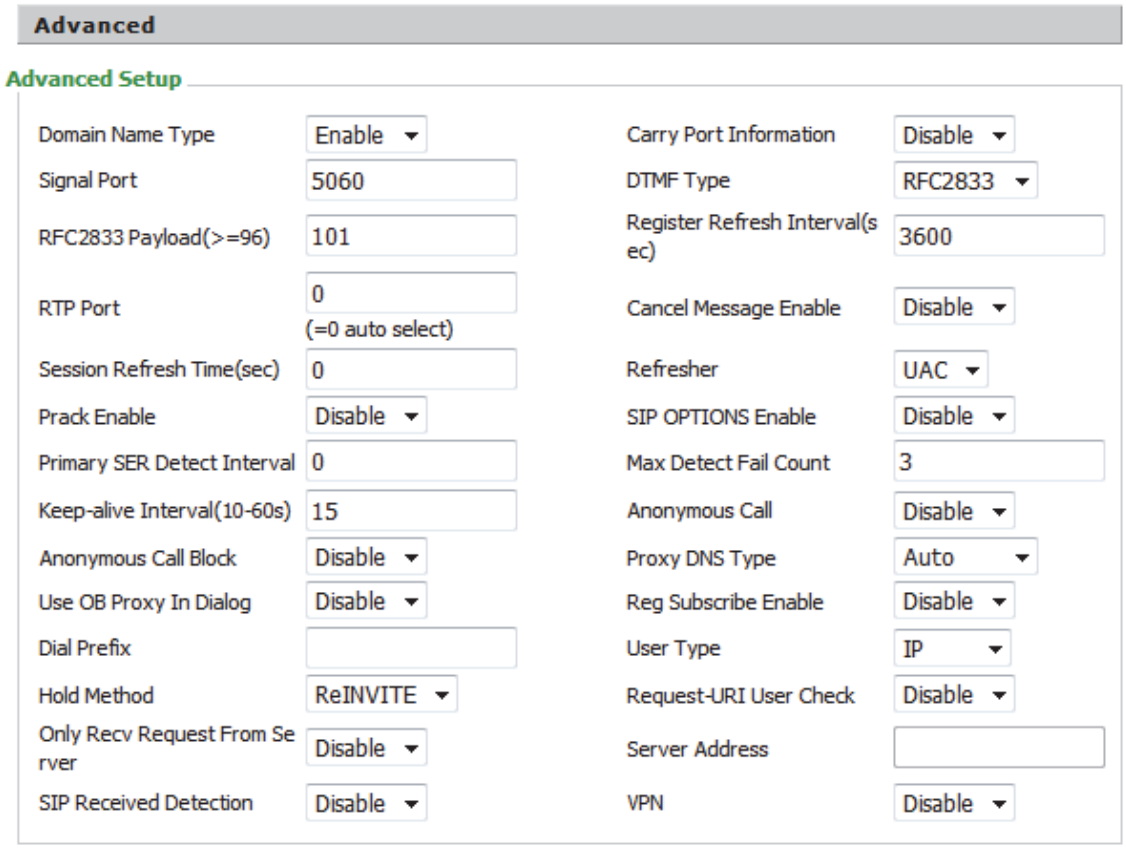
| | |
|---|---|
| **Silence Supp** | If or not enable silence |
| **Echo Cancel** | If or not enable echo cancel, default is enable |
| **Auto Gain Control** | If or not enable auto gain. |
| **T.38 Enable** | If or not enable T.38 |
| **T.38 Redundancy** | If or not enable T.38 Redundancy |
| **T.38 CNG Detect Enable** | If or not enable T.38 CNG Detect |
| **gmd attribute Enable** | If or not enable gmd attribute. |

3) Supplementary Service Subscription




| **Field Name** | **Description** |
|---|---|
| **Call Waiting** | If or not enable Call Waiting |
| **Hot Line** | Fill in the hotline number. Pickup handset or press handsfree/headset button, the device will dial out the hotline number automatically. |
| **MWI Enable** | If or not enable MWI (message waiting indicate). If the user needs to user voice mail, please enable this feature. |
| **Voice Mailbox Numbers** | Fill in the voice mailbox phone number, Asterisk platform, for example, its default voice mail is *97 |
| **VMWI Serv** | If or not enable VMWI service. |
| **DND** | If or not enable DND (do not disturb). If enable, any phone call cannot arrive at the device; default is disable. |
| **Speed Dial** | Enter the speed dial phone numbers.<br>Dial *74 to active speed dial function.<br>Then press the speed dial numbers, for example, press 2, phone will dial 075526099365 directly. |

4) Advanced

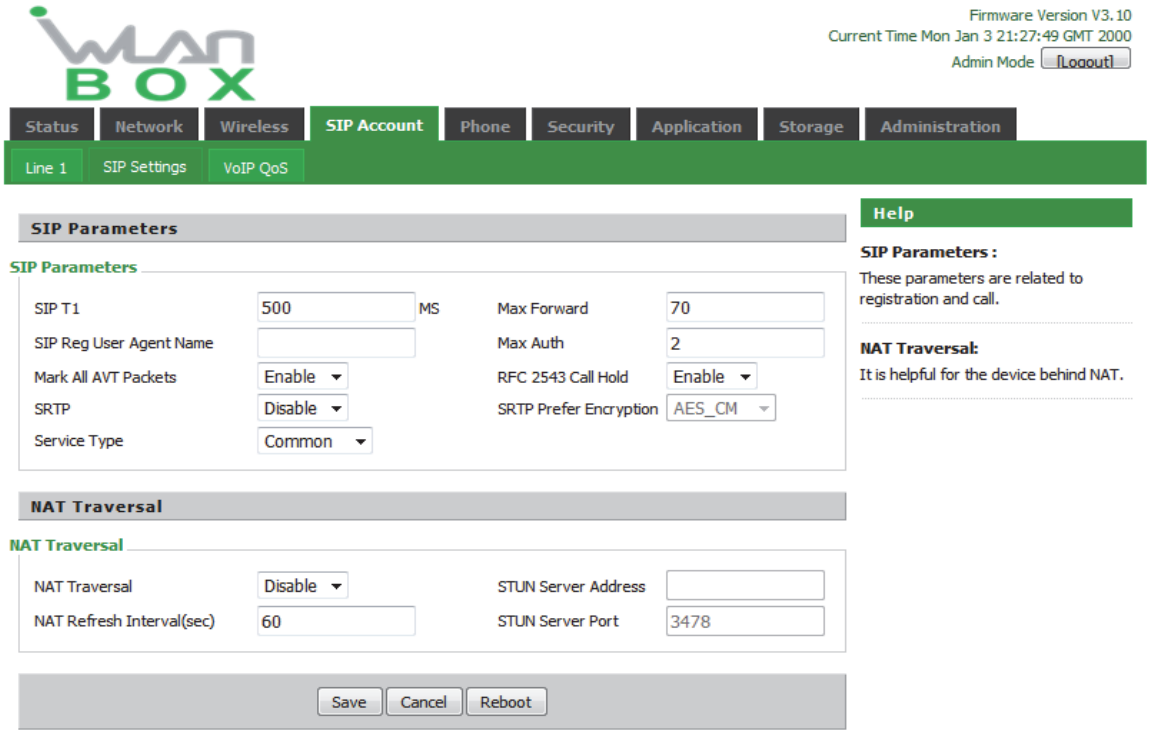



| Field | Name Description |
|---|---|
| **Domain Name Type** | If or not use domain name in the SIP URI. |
| **Carry Port Information** | If or not carry port information in the SIP URI. |
| **Signal Port** | The local port of SIP protocol, default is 5060. |
| **DTMF Type** | Choose the DTMF type from Inbound, RFC2833 and SIP INFO. |
| **RFC2833 Payload (>=96)** | User can use the default setting. |
| **Register Refresh Interval** | The interval between two normal Register messages. You can use the default setting. |
| **RTP Port** | Set the port to send RTP. The device will select one idle port for RTP if you set “0”; otherwise use the value which user sets. |
| **Cancel Message Enable** | When you set enable, an unregistered message will be sent before registration, while you set disable, unregistered message will not be sent before registration. You should set the option for different Proxy. |
| **Session Refresh Time (sec)** | Time interval between two sessions, you can use the default settings. |
| **Refresher** | Choose refresher from UAC and UAS. |
| **Prack Enable** | If or not enable prack. |
| **SIP OPTIONS Enable** | When you set enable, the device will send SIP-OPTION to the server, instead of sending periodic Hello message. The sending interval is Keep-alive interval. |

| | |
|---|---|
| **Primary SER Detect Interval** | Test interval of the primary server, the default value is 0, it represents disable. |
| **Max Detect Fail Count** | Interval of detection of the primary server fail; the default value is 3, it means that if detect 3 times fail; the device will no longer detect the primary server. |
| **Keep-alive Interval (10-60s)** | The interval that the device will send an empty packet to proxy. |
| **Anonymous Call** | If or not enable anonymous call. |
| **Anonymous Call Block** | If or not enable anonymous call block. |
| **Proxy DNS Type** | Set the DNS server type, choose from A type and DNS SRV. |
| **Use OB Proxy In Dialog** | If or not use OB Proxy In Dialog. |
| **Reg Subscribe Enable** | If enable, subscribing will be sent after registration message, if not enable, do not send subscription. |
| **Dial Prefix** | The number will be added before your telephone number when making calls. |
| **User Type** | Choose the User Type from IP and Phone. |
| **Hold Method** | Choose the Hold Method from ReINVITE and INFO. |
| **Request-URI User Check** | If or not enable the user request URI check. |
| **Only Recv request from server** | If or not enable the only receive request from server. |
| **Server Address** | The IP address of SIP server. |
| **SIP Received Detection** | If or not enable SIP Received Detection, if enable, use it to confirm the public network address of the device. |

## 4.4.2 SIP setting

1) SIP Parameters:

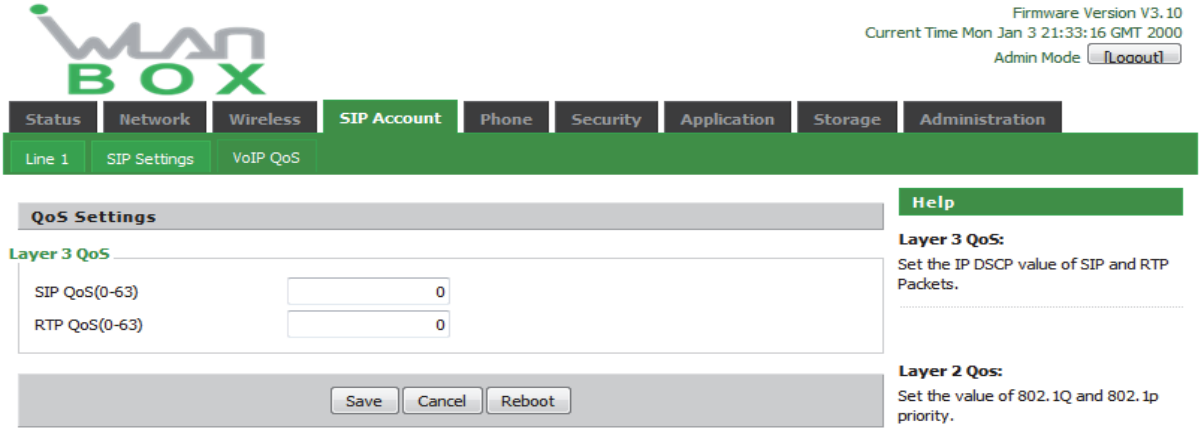


2) NAT Traversal

| Field Name | Description |
|---|---|
| **NAT Traversal** | 1. If or not enable NAT Traversal<br>2. WB100A supports STUN Traversal; If you want to traverse NAT/Firewall, select the STUN. |
| **STUN Server Address** | Add the correct STUN service provider IP address. |
| **NAT Refresh Interval** | Set NAT Refresh Interval, default is 60s. |
| **STUN Server Port** | Set STUN Server Port, default is 5060. |

### 4.4.3 VoIP QoS

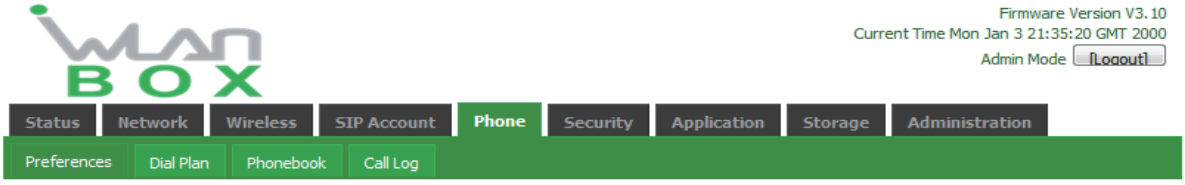
QoS services can improve the quality of voice applications




| Field Name | Description |
|---|---|
| **SIP /RTP QoS** | The default value is 0, you can set a range of values is 0~63 |

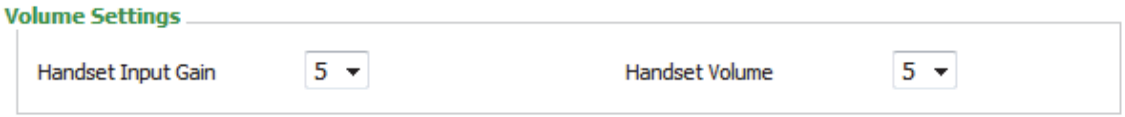
## 4.5 Phone

This page user can set preferences for home gateways, and call logs.




### 4.5.1 Preferences

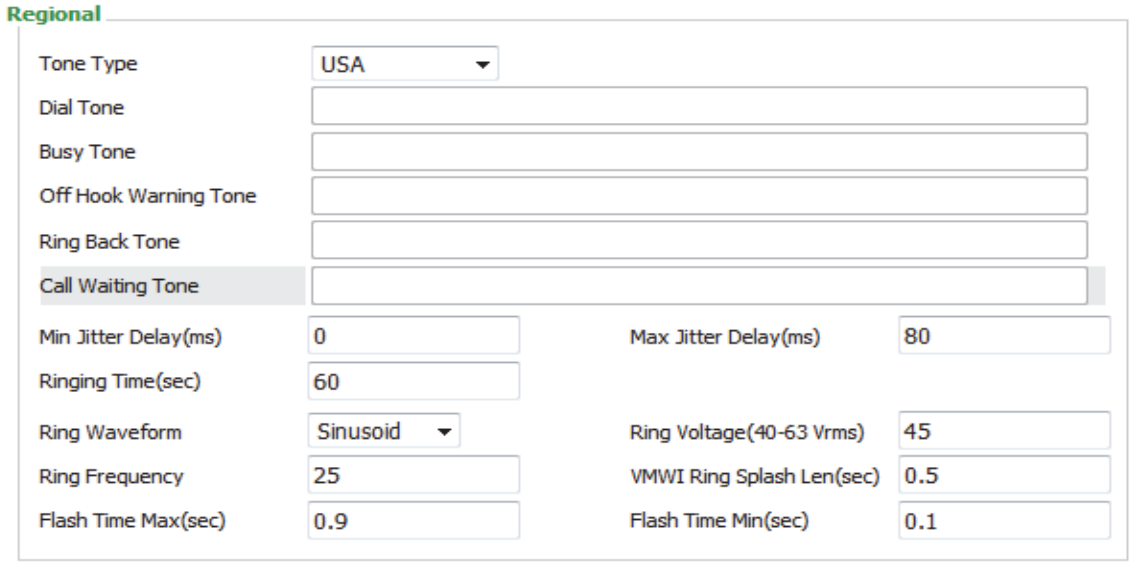
1) Volume Settings




| Field Name | Description |
|---|---|
| **Handset Input Gain** | Adjust the handset input gain from 0 to 7. |

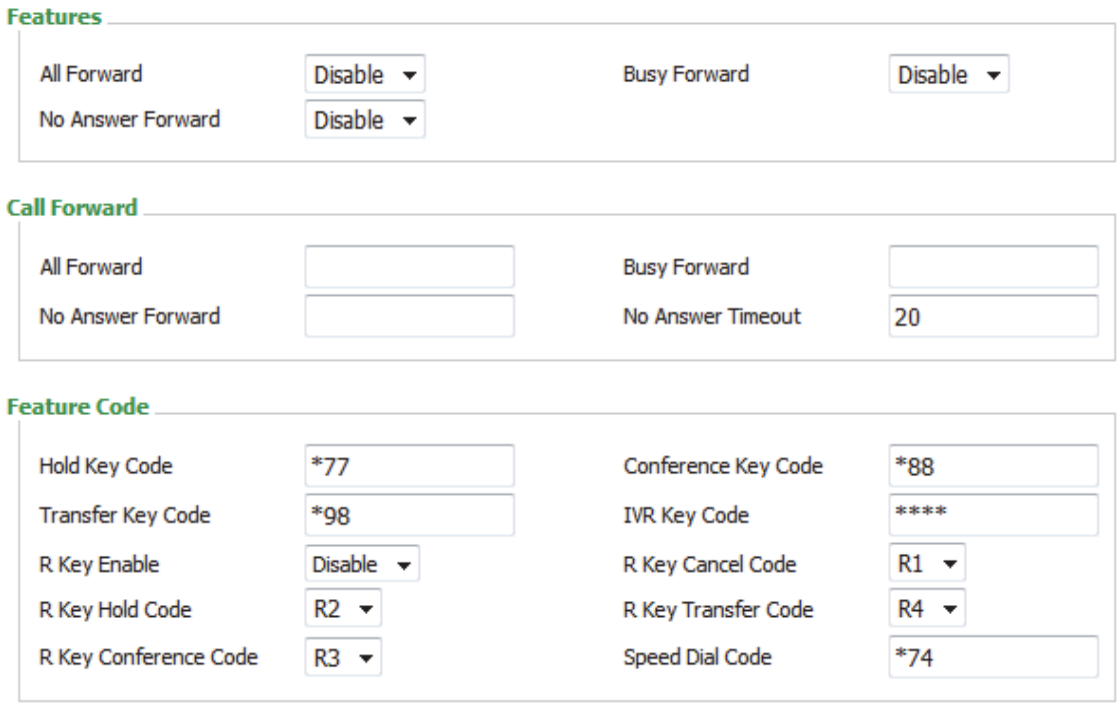
| | |
|---|---|
| **Handset Volume** | Adjust the output gain from 0 to 7. |

2) Regional



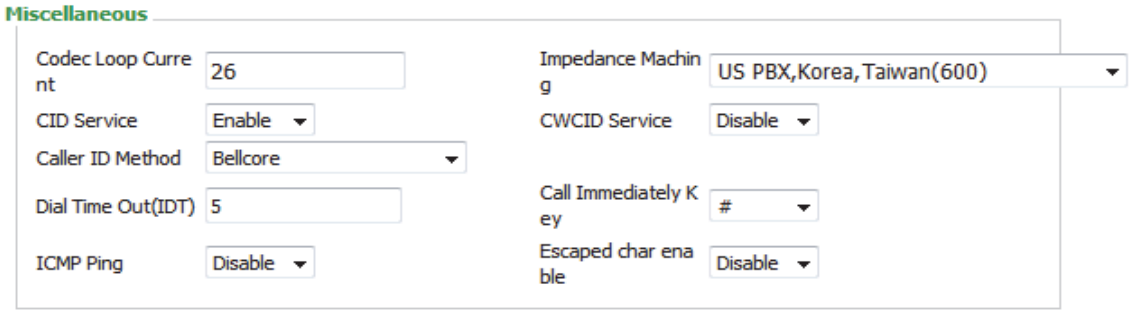

| **Field Name** | **Description** |
|---|---|
| **Tone Type** | Choose tone type form China, US, Hong Kong and so on. |
| **Dial Tone** | Dial Tone |
| **Busy Tone** | Busy Tone |
| **Off Hook Warning Tone** | Off Hook warning tone |
| **Ring Back Tone** | Ring back tone |
| **Call Waiting Tone** | Call waiting tone |
| **Min Jitter Delay** | The Min value of home gateway's jitter delay, home gateway is an adaptive jitter mechanism. |
| **Max Jitter Delay** | The Max value of home gateway's jitter delay, home gateway is an adaptive jitter mechanism. |
| **Ringing Time** | How long WB100A will ring when there is an incoming call. |
| **Regional Ring Waveform** | Select regional ring waveform, options are Sinusoid and Trapezoid, the default Sinusoid. |
| **Regional Ring Voltage** | Set ringing voltage, the default value is 70 |
| **Regional Ring Frequency** | Set ring frequency, the default value is 25 |
| **VMWI Ring Splash Len(sec)** | Set the VMWI ring splash length, default is 0.5s. |
| **Flash Time Max (sec)** | Set the Max value of the device's flash time, the default value is 0.9 |
| **Flash Time Min (sec)** | Set the Min value of the device's flash time, the default value is 0.1 |

3) Features and Call Forward




| Page/Parameter | Description |
|---|---|
| **All Forward** | If or not enable forward all calls |
| **Busy Forward** | If or not enable busy forward. |
| **No Answer Forward** | If or not enable no answer forward. |
| **All Forward** | Set the target phone number for all forward. The device will forward all calls to the phone number immediately when there is an incoming call. |
| **Busy Forward** | The phone number which the calls will be forwarded to when line is busy. |
| **No Answer Forward** | The phone number which the call will be forwarded to when there's no answer. |
| **No Answer Timeout** | The seconds to delay forwarding calls, if there is no answer at your phone. |
| **Hold key code** | Call hold signatures, default is *77. |
| **Conference key code** | Signature of the tripartite session, default is *88. |
| **Transfer key code** | Call forwarding signatures ,default is *98. |
| **IVR key code** | Signatures of the voice menu, default is ****. |
| **R key enable** | If or not enable R key way call features. |
| **R key cancel code** | Set the R key cancel code, option are ranged from R1 to R9, default value is R1. |
| **R key hold code** | Set the R key hold code, options are ranged from R1 to R9, default value is R2. |
| **R key transfer code** | Set the R key transfer code, options are ranged from R1 to R9, default value is R4. |
| **R key conference code** | Set the R key conference code, options are ranged from R1 to R9, default value is R3. |
| **Speed Dial Code** | Speed dial code, default is *74. |

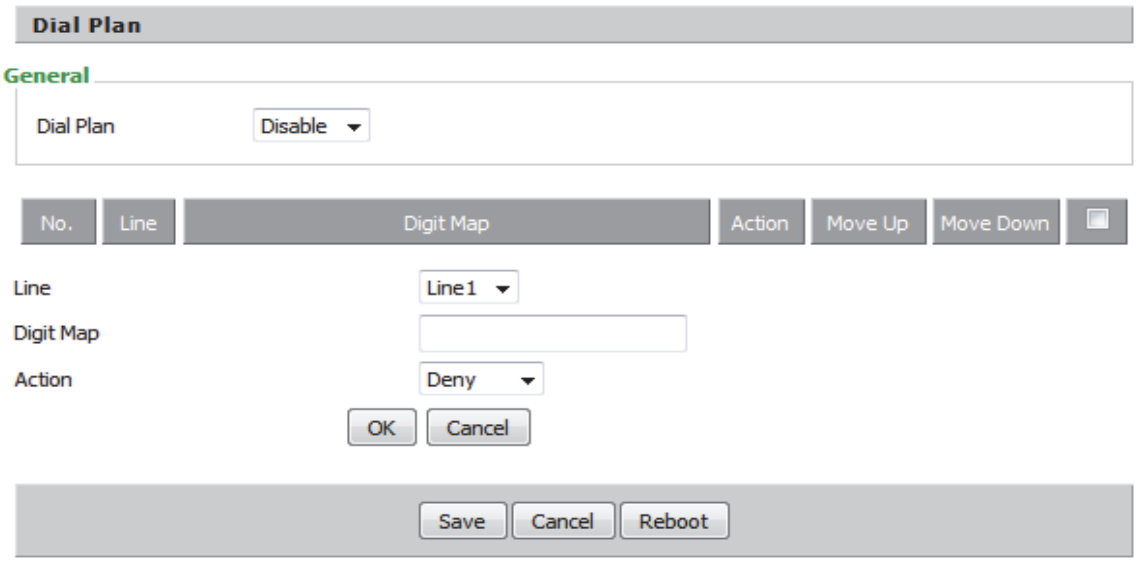
4) Miscellaneous




| Field Name | Description |
|---|---|
| **Codec Loop Current** | Set off-hook loop current, default is 26 |
| **Impedance Maching** | Set impedance matching, default is US PBX,Korea,Taiwan(600). |
| **CID service** | If or not enable displaying caller ID; If enable, caller ID is displayed when there is an incoming call or it won't be displayed. Default is enable. |
| **CWCID Service** | If or not enable CWCID. If enable, the device will display the waiting call's caller ID, or it won't display. Default is disable. |
| **Dial Time Out** | How long WB100A will sound dial out tone when WB100A dials a number. |
| **Call Immediately Key** | Choose call immediately key form * or #. |
| **ICMP Ping** | If or not enable ICMP Ping.<br>If enable this option, home gateway will ping the SIP Server every interval time, otherwise, It will send "hello" empty packet to the SIP Server. |
| **Escaped char enable** | Open special character translation function; if enable, when you press the # key, it will be translated to 23%, when disable, it is just # |

## 4.5.2 Dial Plan

1) Parameters and Settings



| Field Name | Description |
|---|---|
| **Dial Plan** | If or not enable dial plan. |
| **Line** | Set the line. |
| **Digit Map** | Fill in the sequence used to match input number<br>The syntactic, please refer to the following Dial Plan Syntactic |
| **Action** | Choose the dial plan mode from Deny and Dial Out.<br>Deny means WB100A will reject the matched number, while Dial Out means WB100A will dial out the matched number. |
| **Move Up** | Press it to move up. |
| **Move Down** | Press it to move down. |

2) Adding one dial plan:

- Enable Dial Plan
- Click **Add** button, and the configuration table
- Fill in the value of parameters.
- Press **OK** button to end configuration.
- Press **Save** button to save changes
-

3) Dial Plan Syntactic

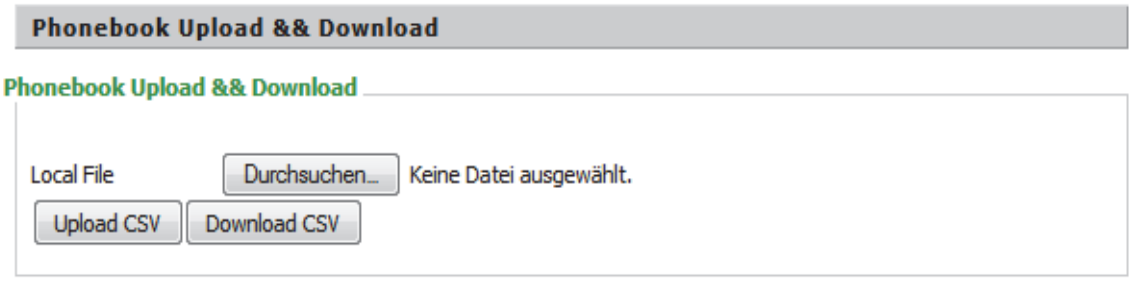
| No. | String | Description |
|---|---|---|
| 1 | 0 1 2 3 4 5 6 7 8 9 * # | Legal characters |
| 2 | x | Lowercase letter x stands for one legal character |
| 3 | [sequence] | To match one character form sequence.<br>For example:<br>• [0-9]: match one digit form 0 to 9<br>• [23-5*]: match one character from 2 or 3 or 4 or 5 or * |
| 4 | x. | Match to , , , …...<br>For example:<br>“01.”:can match ”0”, “01”, “011”, ”0111”, ……., ”01111…” |
| 5 | <dialed:substituted> | Replace dialed with substituted.<br>For example：<br><8:1650>123456 ： input is “85551212”, output is“16505551212” |
| 6 | x,y | Make outside dial tone after dialing “x”, stop until dialing character “y”<br>For example：<br>“9,1xxxxxxxxx”:the device reports dial tone after inputting “9”, stops tone until inputting “1”<br>“9,8,010x”: make outside dial tone after inputting “9”, stop tone until inputting “0” |
| 7 | T | Set the delayed time.<br>For example: |

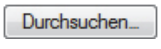
"<9:111>T2": The device will dial out the matched number "111" after 2 seconds.

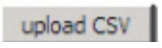
## 4.5.3Phonebook

In this page, user can upload or download phonebook or blacklist file, and can add or delete or edit phonebook and blacklist one by one.

1) Upload&&Download phonebook




Click 

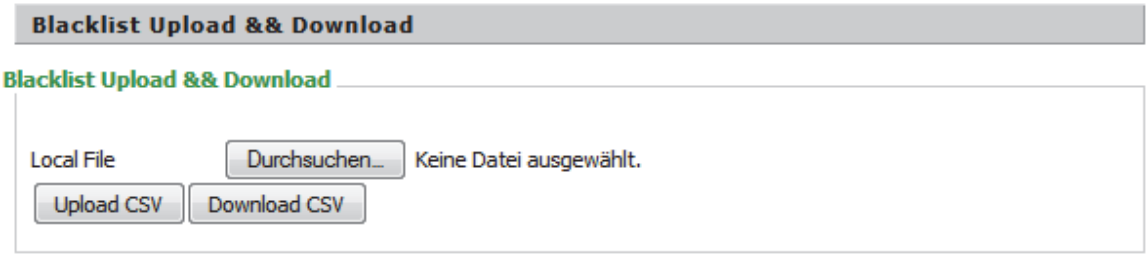
to select the phonebook file and click 

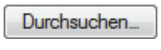
to upload it to WB100A;

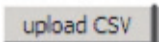
Click

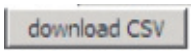
to save the phonebook file to your local computer.

2) Upload&&Download Blacklist



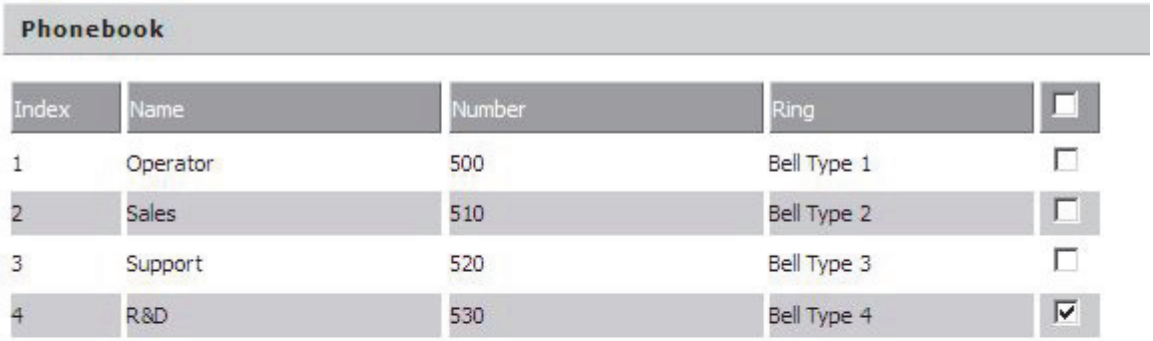

Click 

to select the blacklist file and click 

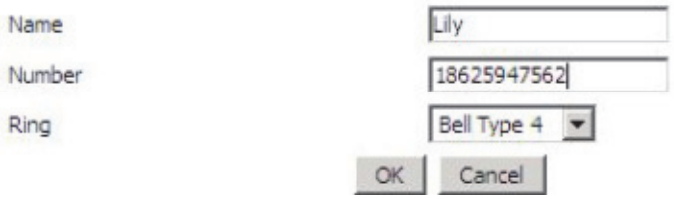
to upload it to WB100A; Click 

to save the blacklist file to your local computer.

3) Phonebook

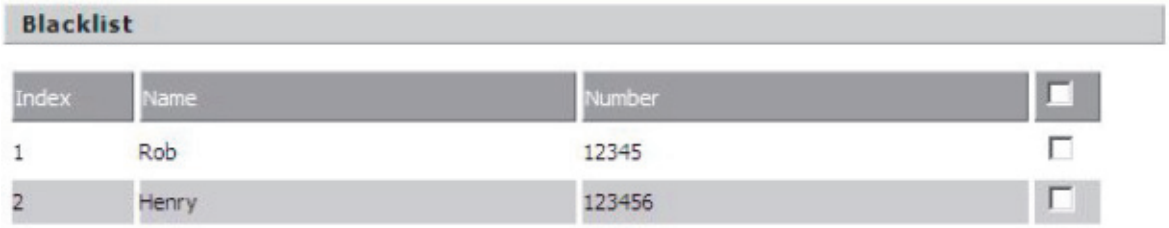


Select one contact, click Edit to edit it, click Delete to delete, and click Move to blacklist to move the contact to blacklist.



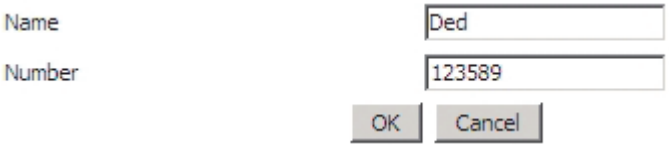

Click Add, user can add one new contact, as the upon picture, enter the contact name and phone number, and select one ring tone, there are ten kinds of different ring tones to choose, click OK to confirm and click Cancel to cancel.

4) Blacklist



Select one contact and click edit to change the information, click delete to delete the contact, click Move to phonebook to move the contact to phonebook.

Click Add to add one blacklist, enter the name and phone number, click OK to confirm and click cancel to cancel.



## 4.5.4 Call Log

To view the call log information such as redial list (incoming call), answered call and missed cal

1) Redial List

**Redial List**

| Index | NUMBER | Start Time | Duration | |
|---|---|---|---|---|
| 1 | 123 | 10/28 10:30 | 00:00:07 | |
| 2 | 010123 | 10/28 12:02 | 00:00:01 | |
| 3 | 010123 | 10/28 16:16 | 00:00:00 | |
| 4 | 010123 | 10/28 16:16 | 00:00:00 | |
| 5 | 123 | 10/28 16:20 | 00:00:13 | |
| 6 | 123 | 10/28 16:21 | 00:00:34 | |
| 7 | 123 | 10/29 10:50 | 00:00:10 | |
| 8 | 123 | 10/29 14:36 | 00:00:01 | |
| 9 | 123 | 10/29 15:05 | 00:00:23 | |
| 10 | 123 | 10/29 15:06 | 00:00:05 | |

2) Answered Calls

**Answered Calls**

| Index | NUMBER | Start Time | Duration | |
|---|---|---|---|---|
| 1 | 22222 | 10/21 09:56 | 00:00:40 | |
| 2 | 110 | 10/21 18:14 | 00:00:03 | |
| 3 | 110 | 10/21 18:15 | 00:00:07 | |
| 4 | sipp | 10/23 13:40 | 00:00:06 | |
| 5 | sipp | 10/24 18:05 | 00:00:05 | |
| 6 | sipp | 10/24 18:05 | 00:00:05 | |
| 7 | sipp | 10/25 15:38 | 00:00:03 | |
| 8 | sipp | 10/25 15:42 | 00:00:06 | |
| 9 | sipp | 10/25 15:55 | 00:00:10 | |
| 10 | sipp | 10/25 16:03 | 00:00:02 | |

3) Missed Call

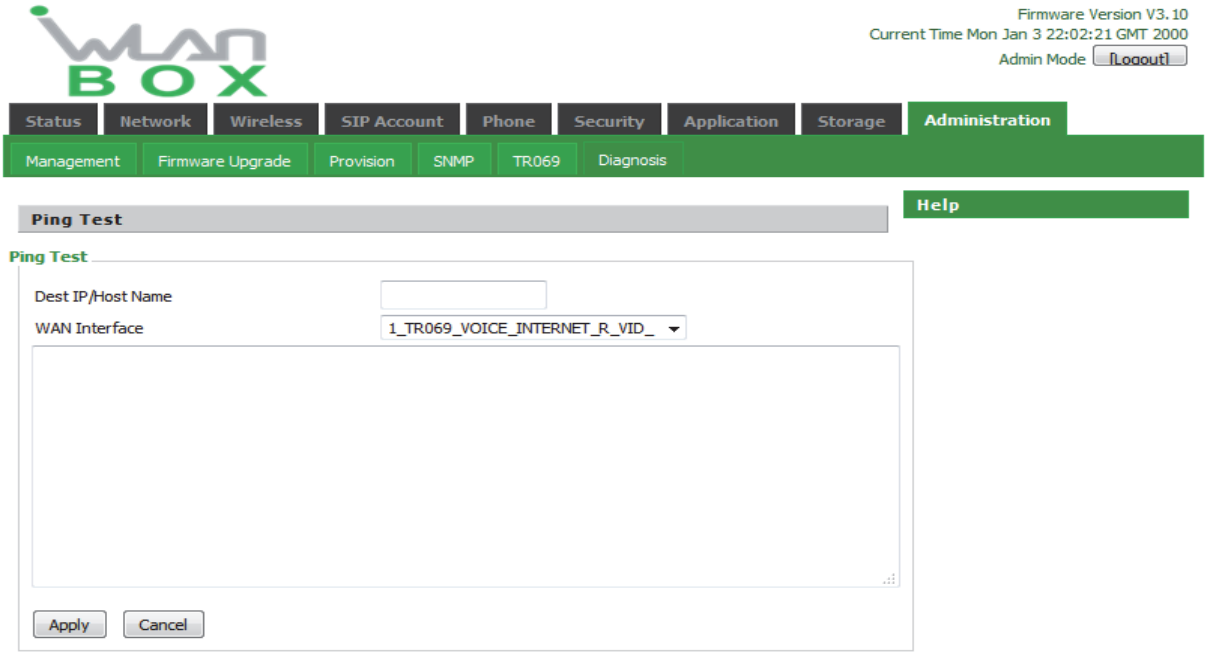
**Missed Calls**

| Index | NUMBER | Start Time | Duration | |
|---|---|---|---|---|
| 1 | 110 | 10/21 09:50 | 00:00:03 | |
| 2 | 555 | 10/22 12:04 | 00:00:03 | |

## 4.6 Diagnosis

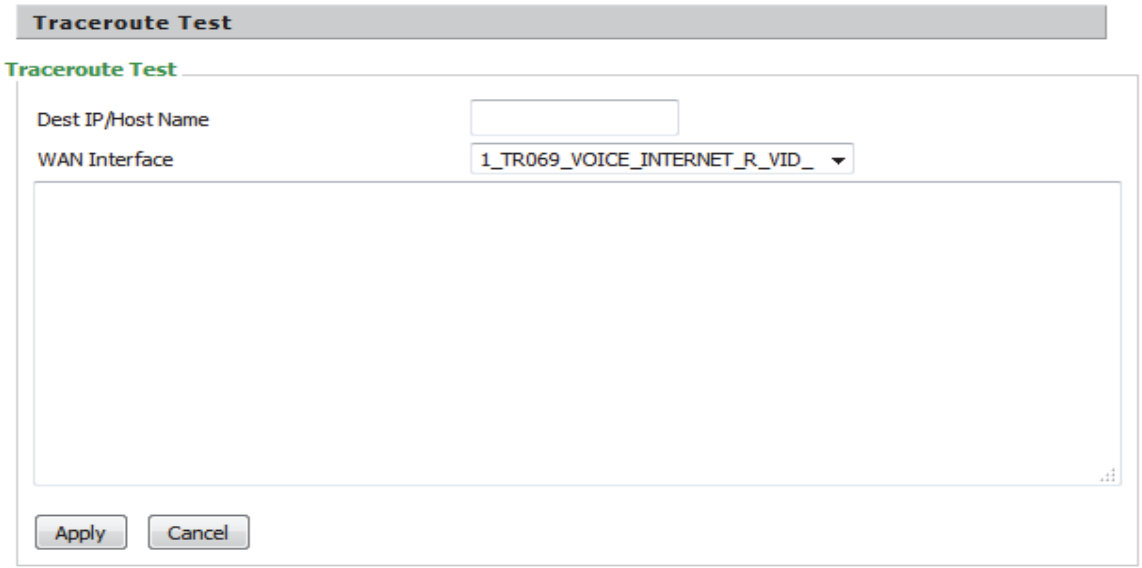
In this page, user can do ping test and traceroute test to diagnose the device's connection status.

1) Ping Test




Enter the destination IP or host name, and then click Apply, device will perform ping test.

2) Traceroute Test




Enter the destination IP or host name, and then click Apply, device will perform traceroute test.

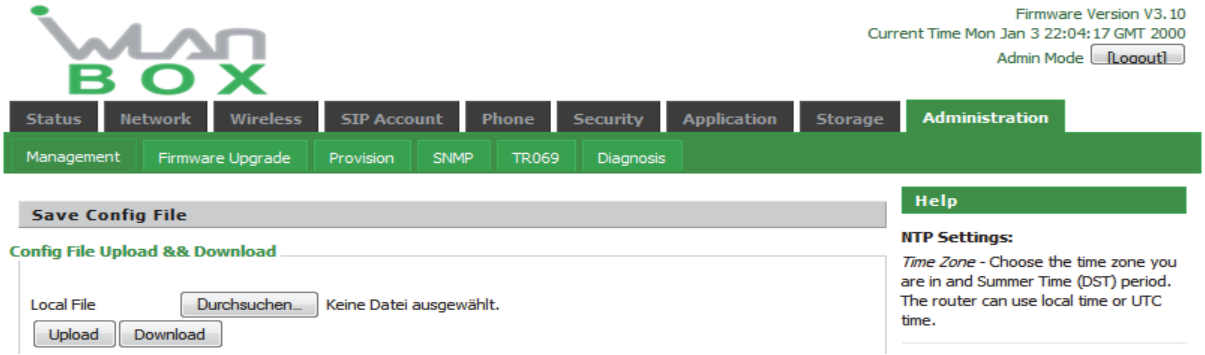
## 4.7 Administration

Use can manage the device in these webpage; you can configure the Time/Date, password, web access, system log and associated configuration TR069

## 4.7.1 Management

You can configure the value of Time/Date, password, web access, and system log and so on.

1) Save config file

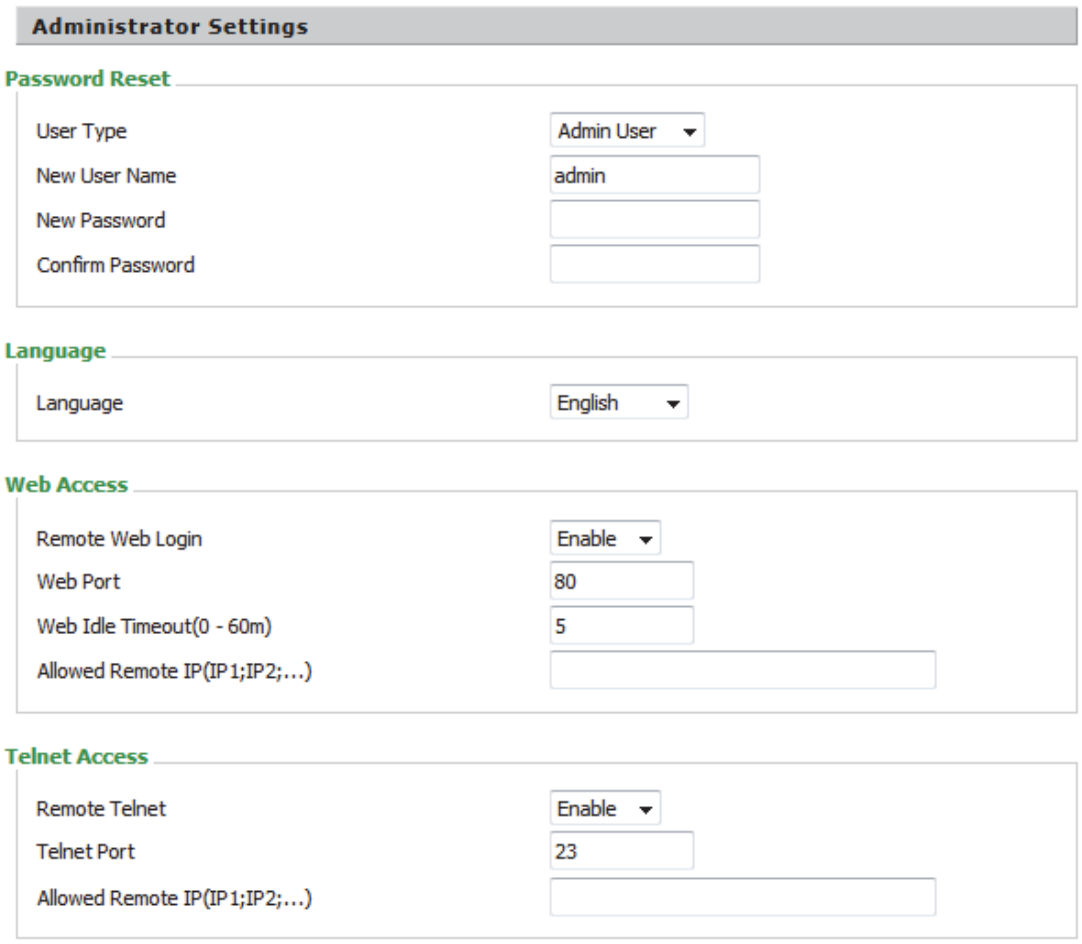



**Config file upload and download**

Upload: click on browse, select file in the local, press the upload button to begin uploading files

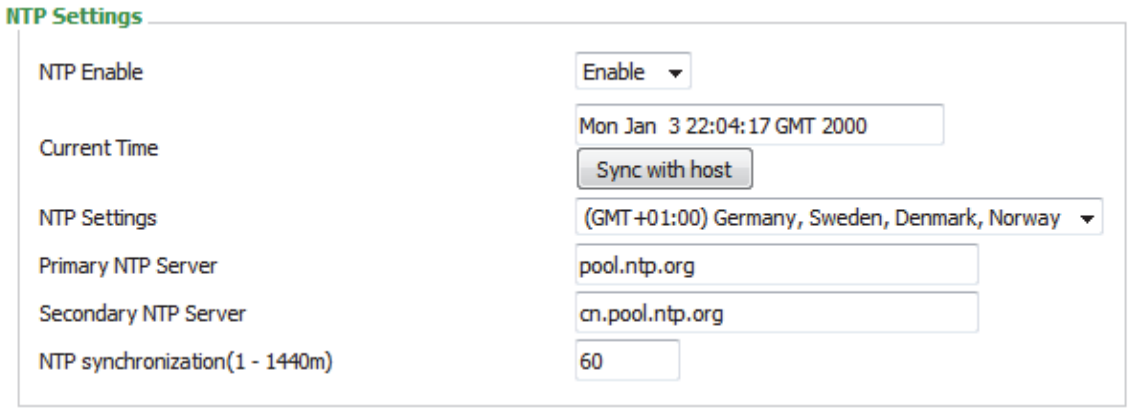
Download: click to download, and then select contains the path to download the configuration file

2）Administrator settings



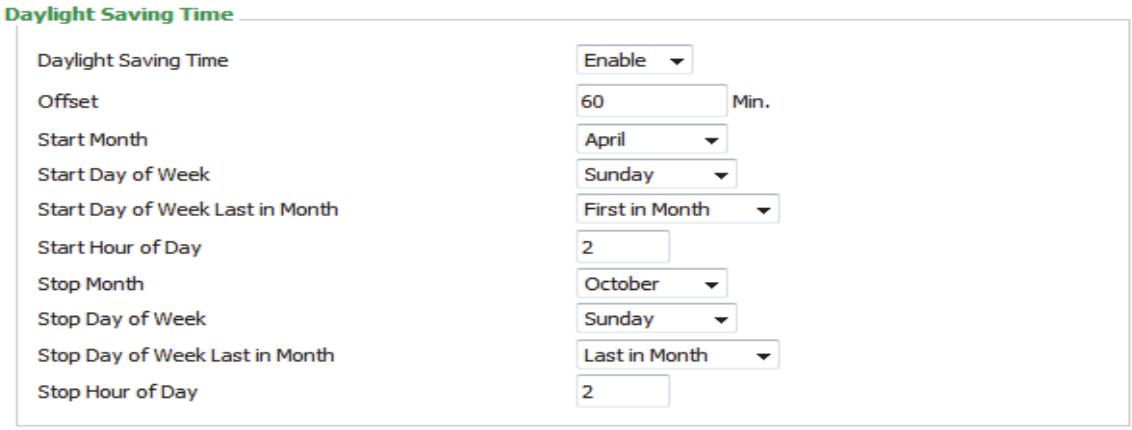
| Field Name | Description |
|---|---|
| **User type** | Choose the user type from admin user and normal user and basic user. |
| **New User Name** | You can modify the user name, set up a new user name |
| **New Password** | Input the new password |
| **Confirm Password** | Input the new password again |
| **Language** | Select the language for the web, the device support Chinese, English, and Spanish and so on. |
| **Remote Web Login** | If or not enable remote Web login |
| **Web Port** | Set the port value which is used to login from Internet port and PC port, default is 80. |
| **Web Idle timeout** | Set the Web Idle timeout time. The webpage can be logged out after Web Idle Timeout without any operation. |
| **Allowed Remote IP** | Set the IP which can login the device remotely. |
| **Remote Telnet** | If or not enable remote telnet login |
| **Telnet Port** | Set the port value which is used to telnet the device. |

3) NTP settings



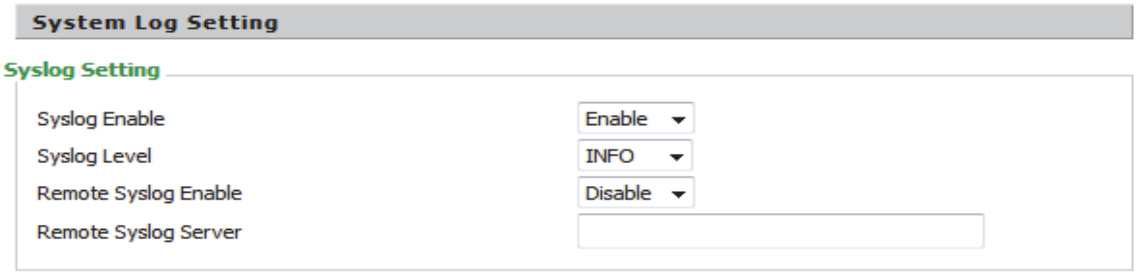

| Field Name | Description |
|---|---|
| **NTP Enable** | If or not enable NTP |
| **Current Time** | Display current time |
| **NTP Settings** | Setting the Time Zone |
| **Primary NTP Server** | Primary NTP server's IP address or domain name |
| **Secondary NTP Server** | Options for NTP server's IP address or domain name |
| **NTP synchronization** | NTP synchronization cycle, cycle time can be 1 to 1440 minutes in any one, the default setting is 60 minutes |

4) Daylight Time




- Set the summer time steps:
- Enable Daylight Saving Time.
- Set value of offset, like the upon picture
- Set staring Month/Week/Day/Hour in **Start Month/Start Day of Week Last in Month/Start Day of Week/Start Hour of Day**, analogously set stopping Month/Week/Day/Hour in **Stop Month/Stop Day of Week Last in Month/Stop Day of Week/Stop Hour of Day**.
- Press **Saving** button to save and press **Reboot** button to active changes.

5) System Log Setting

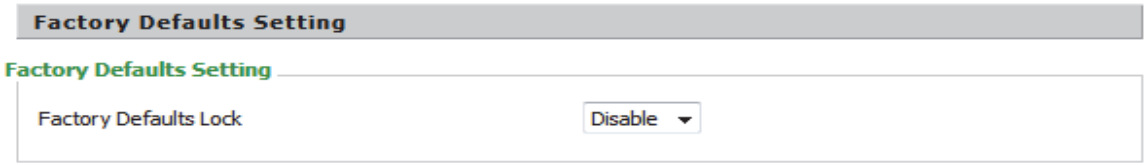



| **Field Name** | **Description** |
|---|---|
| **Syslog Enable** | If or not enable syslog function |
| **Syslog Level** | Select the system log, there is INFO and Debug two grades, the Debug INFO can provide more information. |
| **Remote Syslog Enable** | If or not enable remote syslog function. |
| **Remote Syslog server** | Add a remote server IP address. |

6) Packet Trace

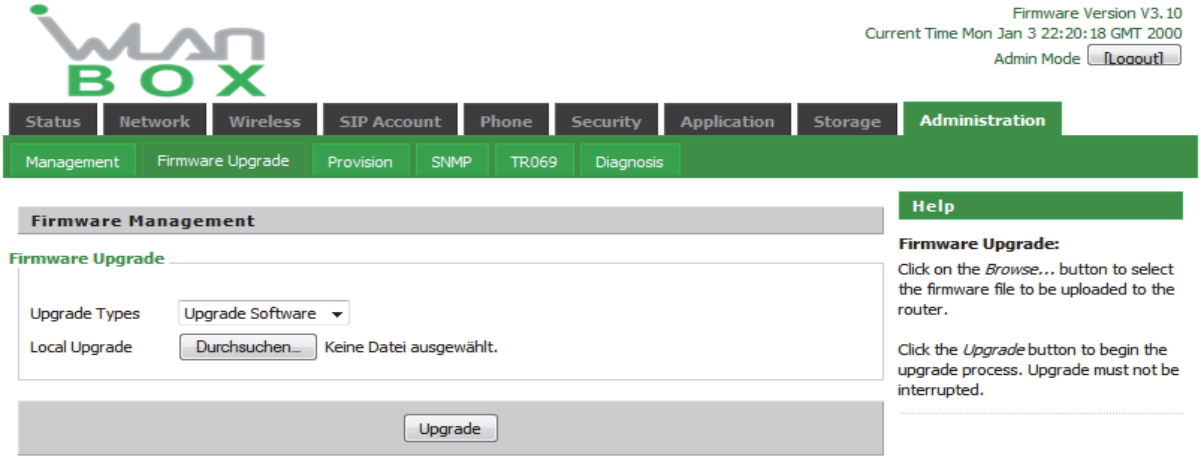
Users can use the packet trace feature intercepts the packets that were sent. Click the Start button, start dhome gateway tracking and keep refreshing the page until the message trace shows to stop, click the Save button to save captured packets.

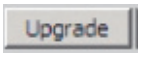
7) Factory settings




Click Factory Default to restore the residential gateway to factory settings.

## 4.7.2 Firmware Upgrade



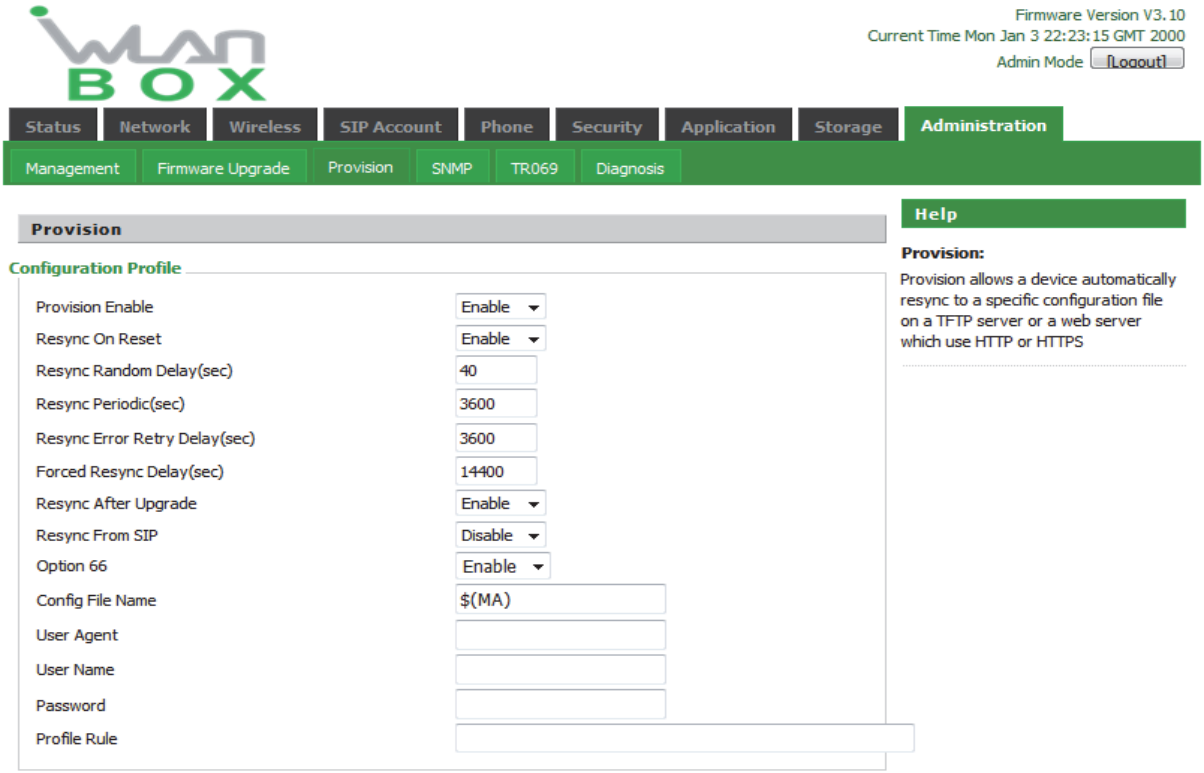

Press to select the firmware file and press  to upgrade the firmware.

## 4.7.3 Provision

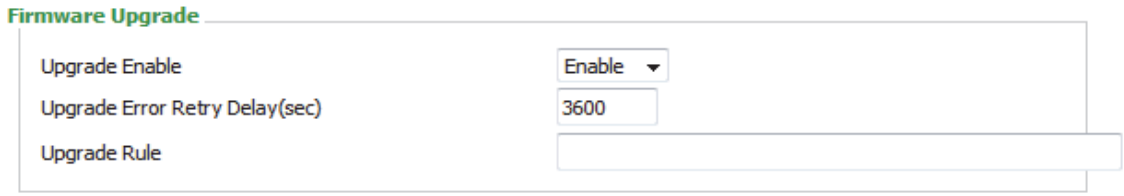
Provisioning allows WB100A auto-upgrading and auto-configuring, this device support TFTP, HTTP and HTTPs three ways.

- Before testing or using TFTP, user should have tftp server and upgrading file and configuring file.
- Before testing or using HTTP, user should have http server and upgrading file and configuring file.
- Before testing or using HTTPS, user should have https server and upgrading file and configuring file and CA Certificate file(should same as https server's) and Client Certificate file and Private key file(HTTPS provision will be supported soon)

User can uploading CA Certificate file and Client Certificate file and Private Key file in Security page.

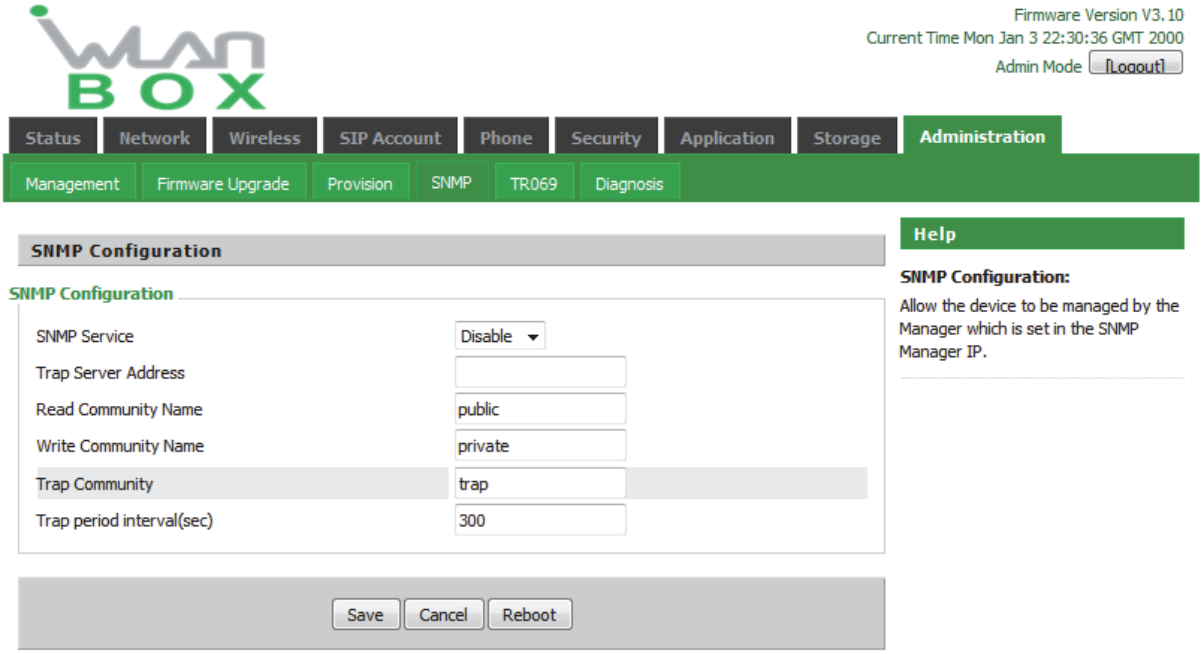



| Field Name | Description |
|---|---|
| **Provision Enable** | If or not enable provision. |
| **Resync on Reset** | If or not enable resync after DIV378 restart |
| **Resync Random Delay (sec)** | Set the maximum delay for request the synchronization file, default is 40. |
| **Resync Periodic (sec)** | If the last resync was failure, WB100A will retry resync after the “Resync Error Retry Delay ” time, default is 3600s. |
| **Resync Error Retry Delay (rec)** | Set the periodic time for resync, default is 3600s. |
| **Forced Resync Delay (sec)** | If it’s time to resync, but WB100A is busy now, in this case, WB100A will wait for a period time, the longest is “Forced Resync Delay”, default is 14400s, when the time over, WB100A will forced to resync. |
| **Resync After Upgrade** | If or not enable firmware upgrade after resync, by default it is enabled. |
| **Resync From SIP** | If or not enable resync from SIP. |
| **Option 66** | It is used for In-house provision mode only. When use TFTP with option 66 to realize provisioning, user must input right configuration file name in IP542N's webpage. When disable **Option 66**, this parameter has no effect. |
| **Config File Name** | It is used for In-house provision mode only. When use TFTP with option 66 to realize provisioning, user must input right configuration file name in IP542N's webpage. When disable **Option 66**, this parameter has no effect. |
| **Profile Rule** | URL of profile provision file<br>Note that the specified file path is relative to the TFTP server’s virtual root directory. |



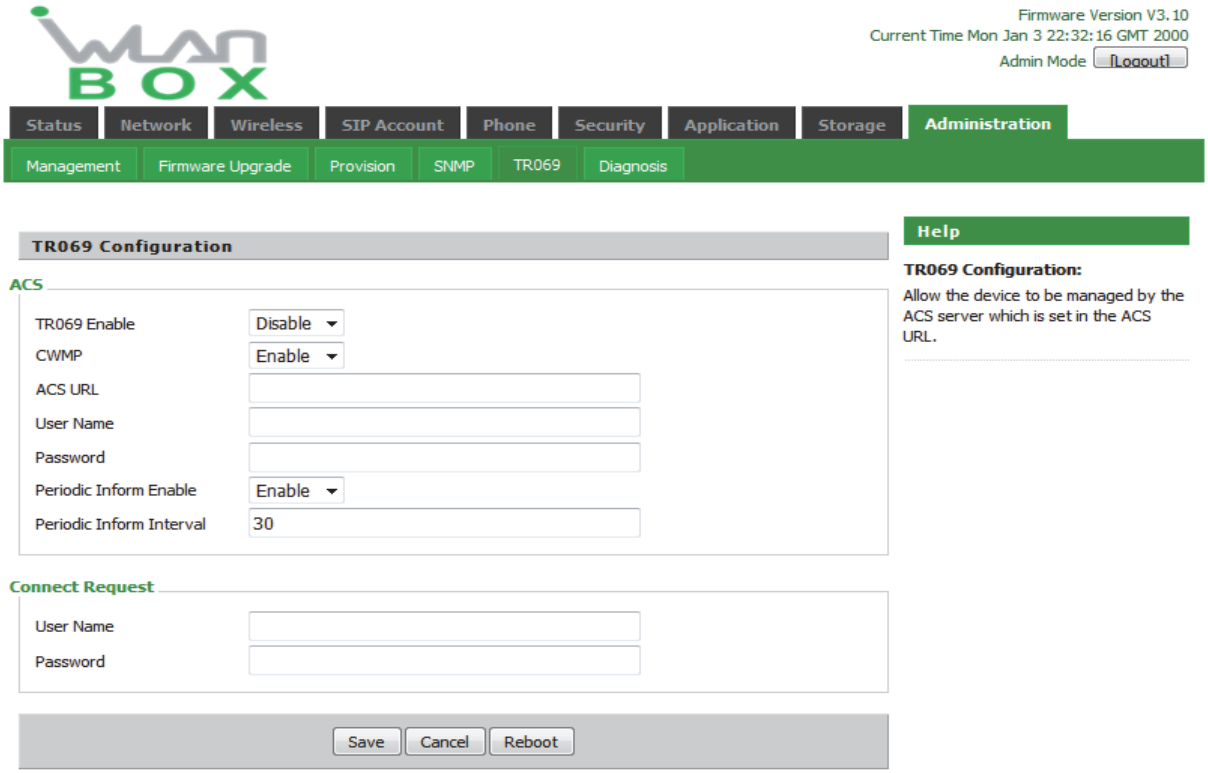

| Field Name | Description |
|---|---|
| **Upgrade Enable** | If or not enable firmware upgrade via provision. |
| **Upgrade Error Retry Delay (sec)** | If the last upgrade fails, WB100A will try upgrading again after “Upgrade Error Retry Delay” period, default is 3600s. |
| **Upgrade Rule** | URL of upgrade file |

## 4.7.4 SNMP




| Field Name | Description |
|---|---|
| **SNMP Enable** | If or not enable SNMP. |
| **Trap Server Address** | Enter the trap server address. |
| **Read Community Name** | String, as an express password between management progress and agent progress. |
| **Write Community Name** | String, as an express password between management progress and agent progress. |
| **Trap Community** | The community field in trap. |
| **Trap period interval (sec)** | The interval of sending trap. |

## 4.7.5 TR069




| Field Name | Description |
|---|---|
| **TR069 Enable** | If or not enable TR069 |
| **CWMP** | If or not enable CWMP |
| **ACS URL** | ACS URL address |
| **User Name** | ACS username |
| **Password** | ACS password |
| **Periodic Inform Enable** | If or not enable the function of periodic inform, default is enable |
| **Periodic Inform Interval** | Periodic notification interval, the unit is seconds, default is 43200s |
| **User Name** | The username used to connect the TR069 server to the DUT. |
| **Password** | The password used to connect the TR069 server to the DUT. |
| **SSL Key** | Fill SSL key |

# 5 Functions

## 5.1 Making Calls

- Dial the number directly and wait for 5 seconds (default No Key Entry Timeout).
- Dial the number with ending char #, WB100A will dial out immediately
- Dial the phone number which matches one dial rule, WB100A will dial out immediately, no need to press # or wait for 5 seconds.

## 5.2 Call Waiting

- Enable waiting feature in SIP-->Line1-->supplementary Service→Call Waiting (default is Enable)
- While in conversation, user will hear a special stutter tone if there is another incoming call.
- User then can press “*77” (or Flash button)to put the current call party on hold automatically and switch to the other call. Pressing “*77”(or Flash button) toggles between two active calls.

## 5.3 Call Hold

- While in conversation, pressing the “*77”(or Flash button), will put the remote end on hold.
- Pressing the “*77”(or Flash button) again, will release the previously Hold state and resume the bi-directional media.

## 5.4 Call Transferring

WB100A supports blind transfer and attended transfer.

### 5.4.1 Blind Transfer

Assuming that call party A and party B are in conversation, A wants to Blind Transfer B to C

- Party A dials *98, A will hear dialing tone
- Dial party C’s number, and press # (or wait for 5 seconds) to call C, then C will ring, A will
- be disconnected.
- If C answer the call, B and C can go on talking.

### 5.4.2 Attended Transfer

Assuming that call party A and B are in conversation. A wants to Attend Transfer B to C:

- Party A dials *77 to hold B, A will hear dialing tone
- Dial party C’s number, and press # (or wait for 5 seconds) to call C, then A will hear ringing tone.
- If C answer the call, A will talk with C firstly
- If C wants to talk with B, A press “*98” to transfer, and then C will talk with B. If C does not
- talk with C successfully, A will talk with B again.

## 5.5 3-way conference call

Assuming that call party A and B are in conversation. A wants to add C to the conference:
Step 1.Party A dials *77 to hold B, A will hear dialing tone
Step 2.Dial party C's number, and press # (or wait for 5 seconds) to call C, then A will hear ringing tone.
Step 3.If C answer the call, A will talk with C firstly
Step 4.If C receive the conference, A press "*88" to add C to the conference, and then A,B and C are in conference.

## 5.6 Call Forwarding

- Open Phone→Preferences→Call Forward, enable the one call forward mode and fill forwarded number
- WB100A will forward incoming call to the forwarded number according to the settings of Call Forward and call status

## 5.7 Speed dialing

Notice: The current firmware does not support speed dial, will be added in new branch firmware.

- Set phone number(E.g.3333) in SIP Account→Line 1→Speed Dial, and then save the changes
- Dial*74 to active speed dial function
- Then dial 2 to call 3333, and WB100A will dial out immediately.

## 5.8 Daylight Saving Time

Daylight Saving Time (or summer time as it is called in many countries) is a way of getting more light out of the day by advancing clocks by some hour during the summer. During Daylight Saving Time, the sun appears to rise one hour later in the morning, when people are usually asleep anyway, and sets one hour later in the evening, seeming to stretch the day longer.

- Open Administration/Management webpage.
- Enable parameter Daylight Saving Time in Time/Date.
- Set offset: "-60" means advancing 60min, "60" means delaying 60min.
- Set starting Month/Week/Day/Hour in Start Month/Start Day of Week Last in Month/Start Day of Week/Start Hour of Day, analogously set stopping Month/Week/Day/Hour in Stop Month/Stop Day of Week Last in Month/Stop Day of Week/Stop Hour of Day.
- Press Saving button to save and press reboot button to active changes.

## 5.9 Upgrade Firmware

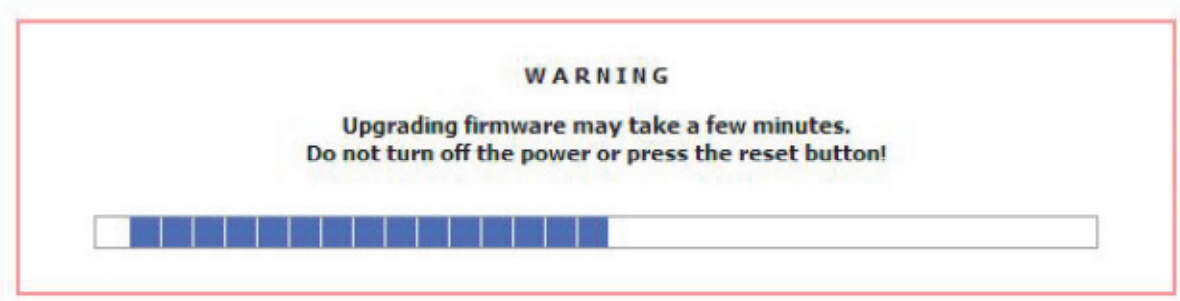
Function is to upgrade firmware in local.

- Open Administration/Firmware Upgrade webpage
- Press

to browse a firmware file
- Press to

start upgrading

- When upgrading, there will be prompt like below




## 5.10 Password Control

Function is to reset password.

- Open Administration/Management webpage
- Choose password type
- Input current password (Original Password, default is “admin” for admin level and user for user level),
- Input new password in New Password and Password Confirm.
- Press Save Settings button to save and then press Reboot button to make changes effective.

## 5.11 System log

User can view system log in local or in remote.
In local:

- Open Administration/Management page, System Log Setting column.
- Choose log level from INFO and Debug, in INFO level, WB100A records INFO log, and in
- Debug level, WB100A records all debug information.
- Press Save button to save and then press Reboot button to make changes effective.

In remote:

- Open Administration/Management page, System Log Setting column.
- Fill system server IP Address or domain name into Syslog Server.
- Choose log level from INFO and Debug, in INFO level, WB100A records INFO log, and in
- Debug level, WB100A records all debug information.
- Press Save button to save and then press Reboot button to make changes effective.